# SENSELCITY

'Architecture as an interface between two worlds'

"To the weirdos, the misfits, the rebels, the troublemakers, the round pegs in square holes… the figures who see things differently – who don't like rules…

You can quote them, disagree with them, praise them or knock them down, but the only thing you can't do is ignore them because they bring about change... they push the human race forward, and although they are considered crazy by some, we see the genius, because those who are crazy enough to think that they can change the world are also the ones who do it."

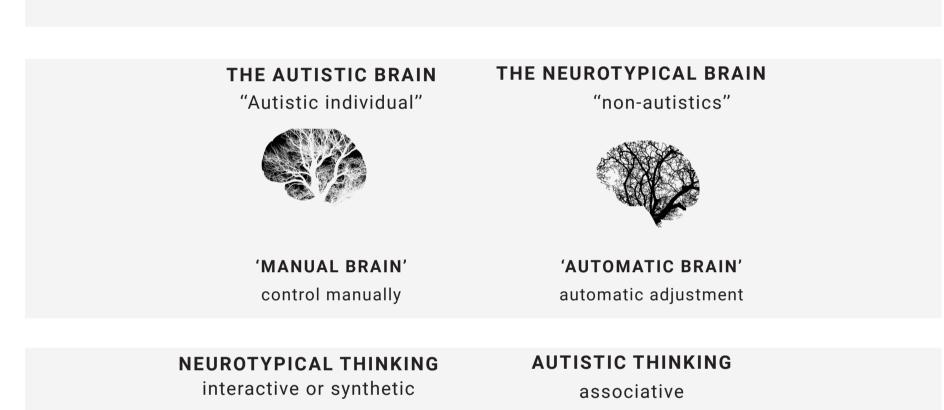
Steve Jobs

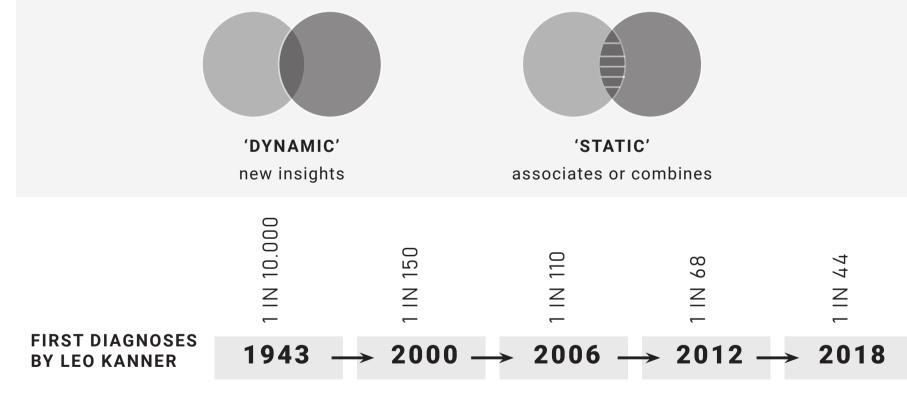
#### **AUTISM SPECTRUM DISORDER - (ASD)**

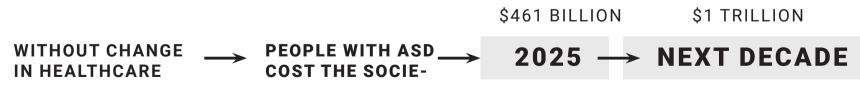
Overstimulated by smells, sounds, and textures. Perhaps incomprehensible to us, but this is what people with an Autism Spectrum Disorder (ASD) deal with daily.

ASD is a neurobiological developmental disorder. This means that the way the brain is connected affects development. The different parts of the brain have trouble communicating and processing all this information.

They experience life completely different. The different information cannot be put into context, which makes the world a lot more complicated.







ASD COSTS SOCIETY TWICE AS MUCH AS BRAIN HAEMORRHAGES AND HIGH BLOOD PRESSURE



#### **CHANGE STANDARDS**

Why do we accept a standard that distinguishes between socially, economically, physically or mentally disadvantaged or vulnerable people?
Why do we create architecture that does not apply to everyone?

#### **GOAL**

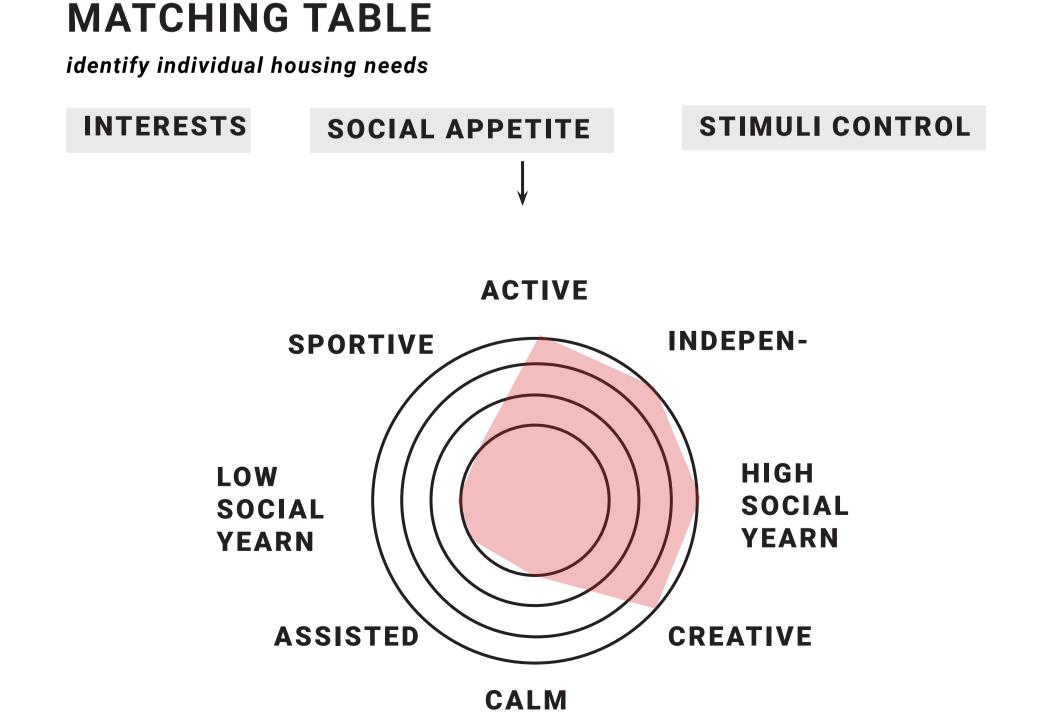
Creating a living environment in the middle of society, but with minimal/adjustable external incentives.

"Everybody, healthy or not, disabled or otherwise, encounters a positive effect of a nice and fitting physical environment. The same counts for negative effects. For people with autism, these effects are stronger." (Schrameijer, 2013).

#### **PREDICTABILITY HIERARCHY LAYOUT ALIGNMENT** CONTROL **OPTIONS STRUCTURE REPETITION STIMULI PROXIMITY** CONTROL **TRANSITION** LOWER/ **CONTROL - HUMAN CONTROL SPACE** PREDICTABILITY -**STIMULI ENVIRONMENT**

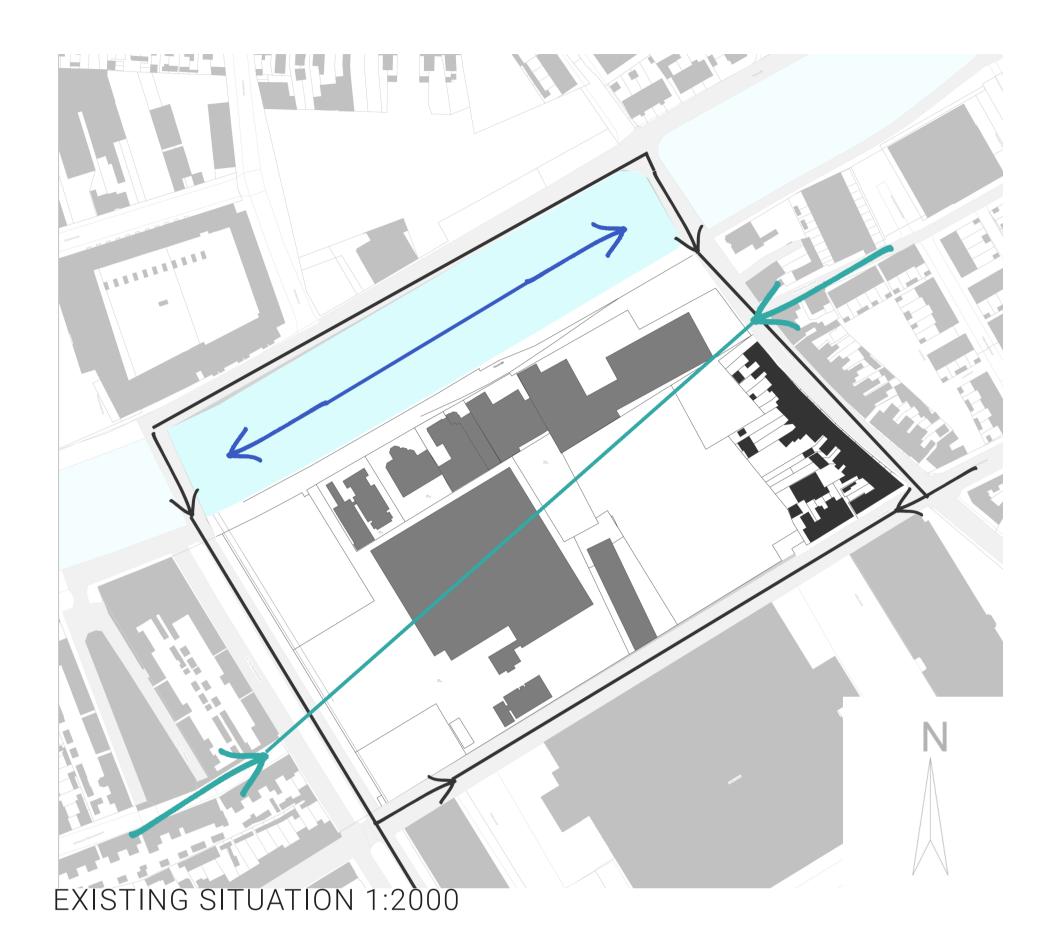
#### **DESIGN PRINCIPLES**

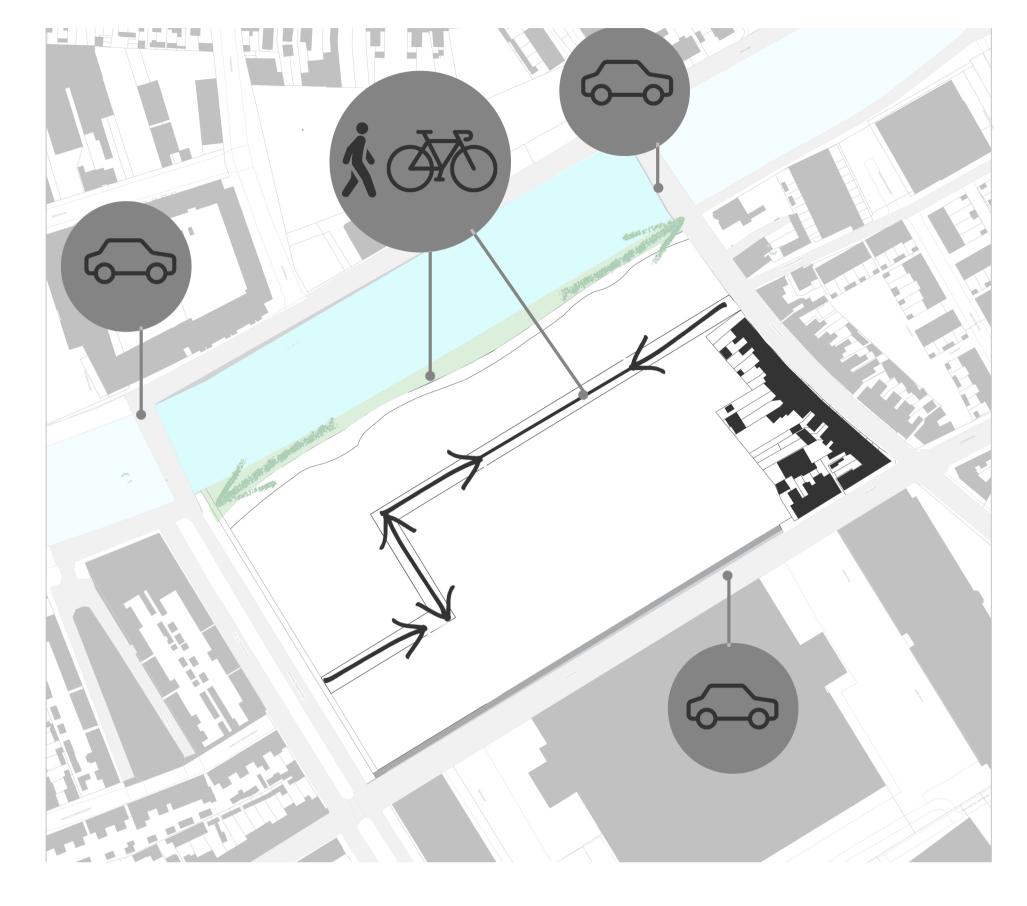


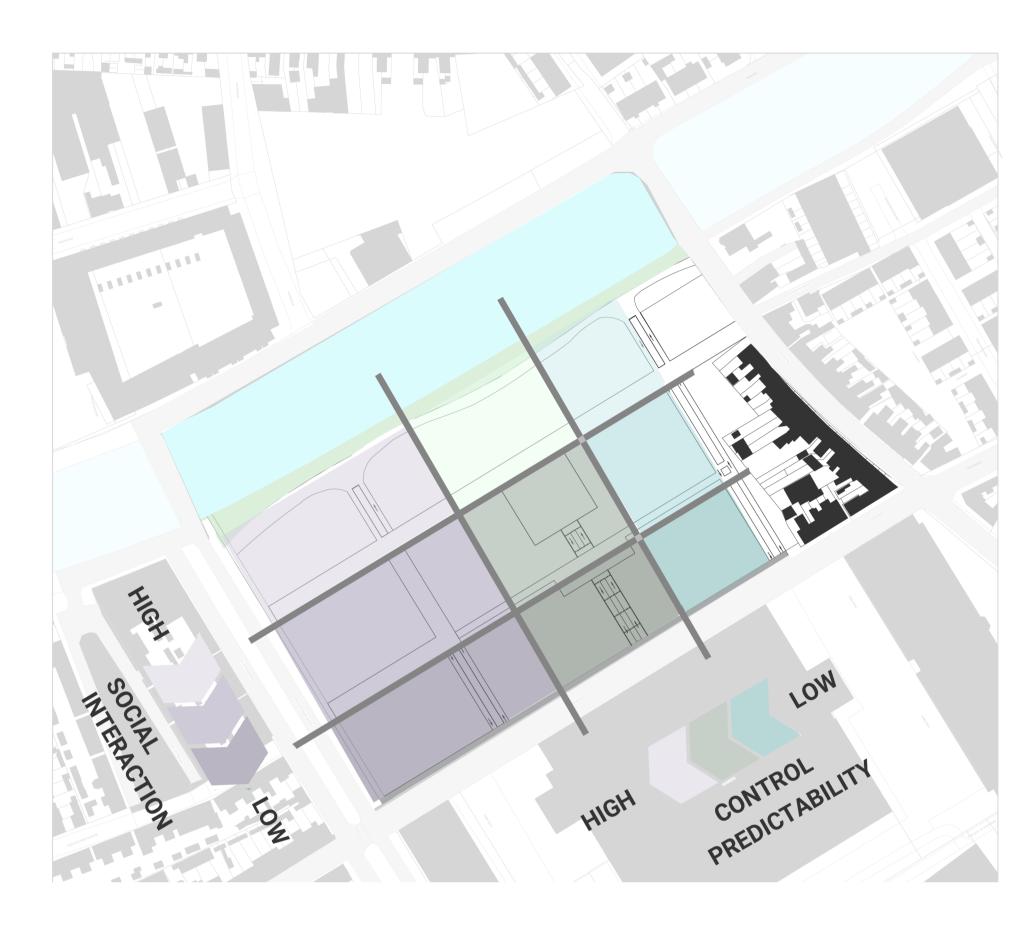


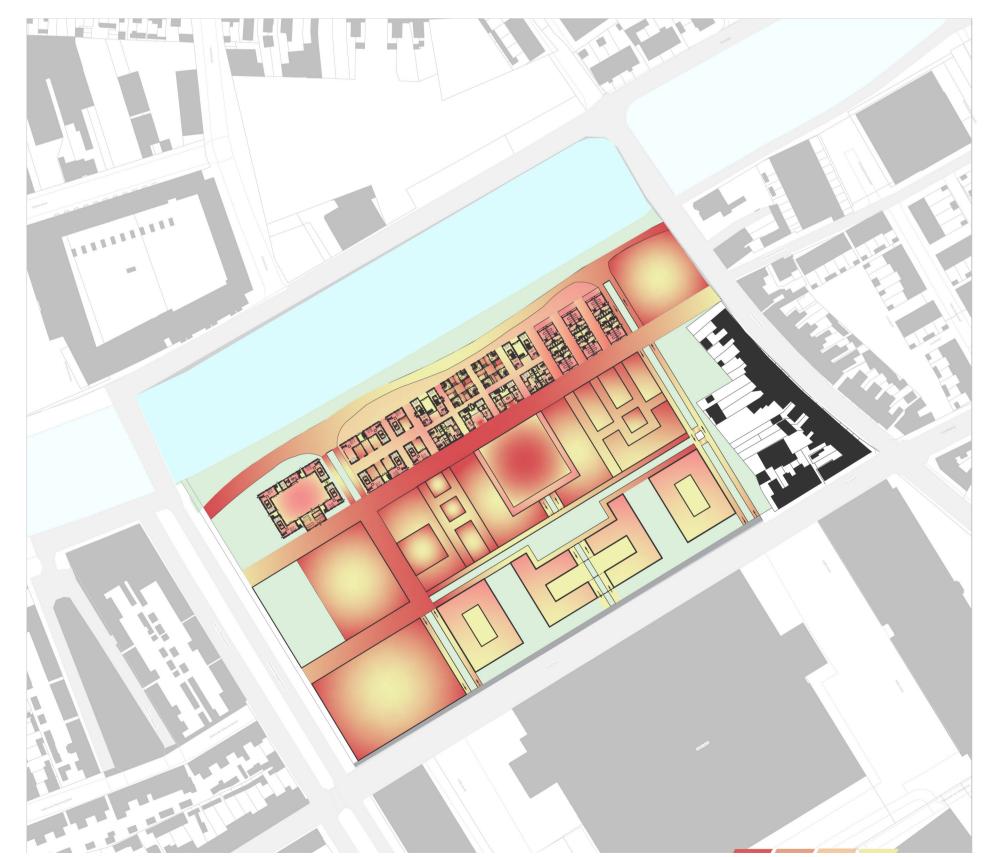
### URBAN-SENSE

ZONING THE URBAN PLAN









#### LOCATION

The site is located at 'het Fabriekskwartier' in Tilburg.

This location is a starting point for several locations that can be redeveloped with the design directions of sense-city.

This location shows how to Assemble a living climate in the center of society, but with minimal/adjustable external stimuli.

#### **ACTIVITY VEIN**

By using an 'activity vein', you assemble a route with dynamic highlights that correspond to the interests of people with autism as well as "neurotypical" thinkers.
Branches to the different zones run from this 'vein'.
Transitional spaces are located on these branches to create the gradation that is needed to create an understandable passage.

#### **GRADATION**

The division of the vein created a gradation in zones, from high to low control and high to low social interchange.

This grid helps to create various types of zoning inside a neighborhood to create a diverse area.

The activities and homes align with the matching stimuli in the zone, so there is always a gradual transition between the connections between activities and living.

#### **HEATH MAP**

The heat map that also can be placed at the homes, is a map that shows a gradation of stimuli in the area.

This way, the residents can review the best route to control the number of stimuli they need at that moment.

#### **URBAN-SENSE**

The activities and homes align with the matching stimuli in the zone, so there is always a gradual transition between the connections between activities and living.

The vein stems from an orthogonal interplay of lines, which contributes to the legibility and predictability of the area. It implies sightlines and an interchange of negative and positive spaces.

By the width of the paths, you can read that you are visiting a place where audiences are more intimate. Smaller paths provide intimacy and wider paths indicate space and openness.

# SENSE OF JOY

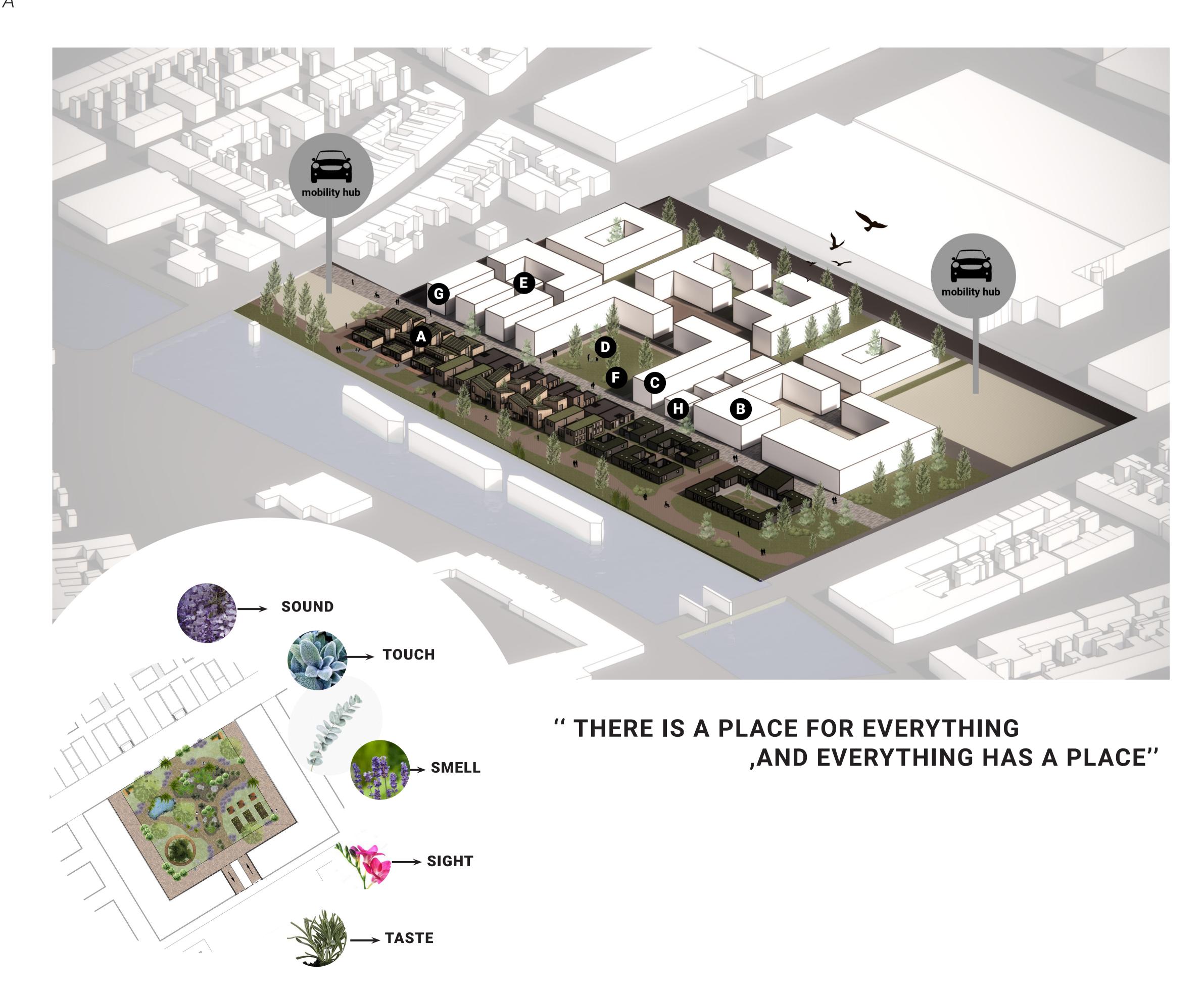
#### **PROGRAM**

The program is aimed at a diverse group of people.
Regardless of sensitivity or interests, everyone can connect here.
This establishes smaller communities among themselves.
The program is not only sought for leisure or daytime activities, but it also offers job opportunities.
The residents can maintain their own activities/spaces.
This gives a sense of togetherness but also a sense of beloning.

- **A** ART GALLERY
- B GYM
- C COMMUNITY CENTER
- D SENSORY GARDEN
- **E** CUDDLE CORNER
- **E** KITCHEN GARDEN
- G MUSIC STUDIO
- HOME-MADE SHOP

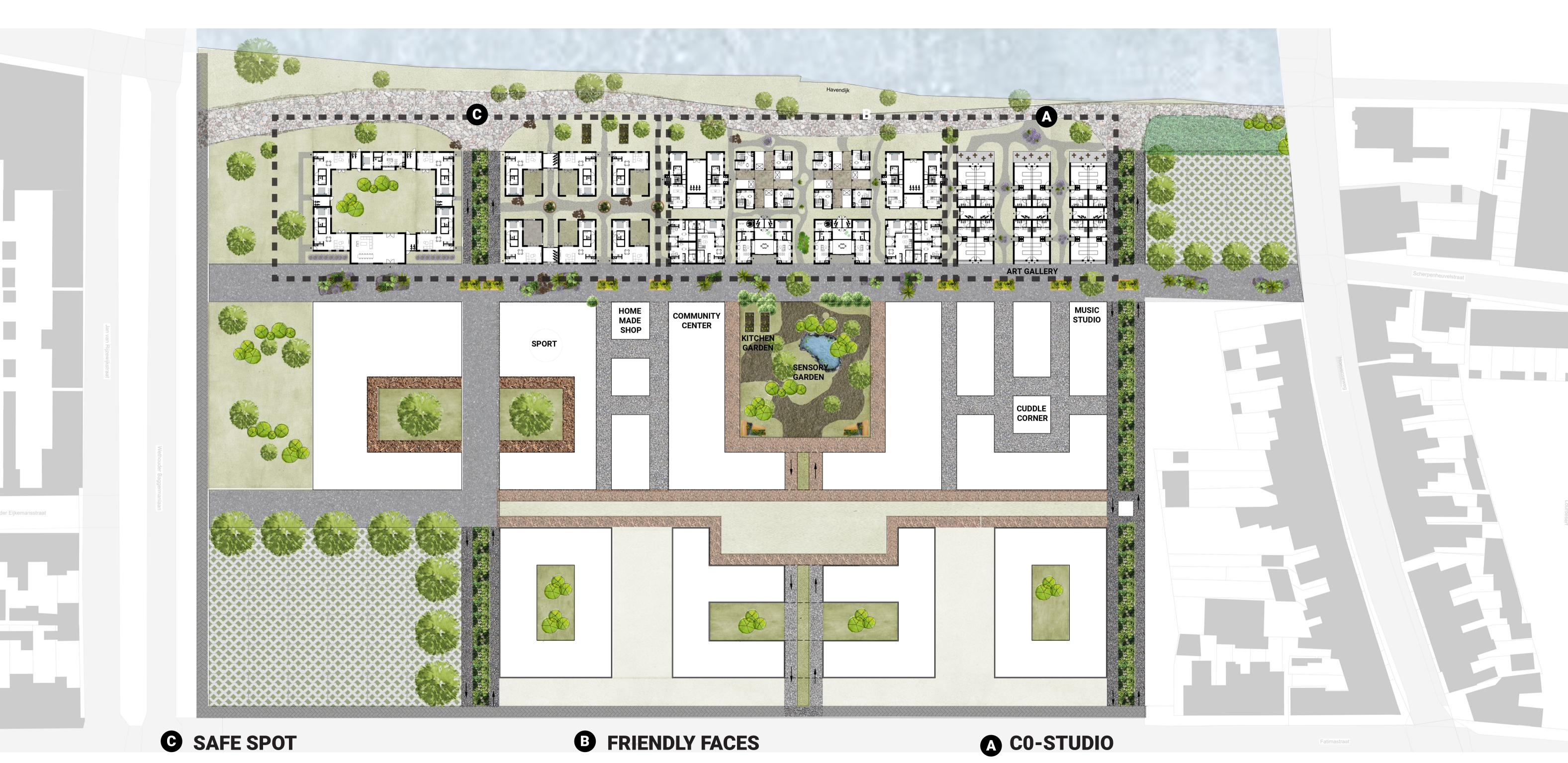
#### **SENSORY GARDEN**

Stimulating and engaging senses.
Allows you to connect to nature and encourages you to become more aware of your surroundings and your response to them, tapping into the principles of mindfulness.



# IT MAKES-SENSE

COMPLETE URBAN DESIGN



- MEET STREET -THE FUSION

- MILL-HOUSE

-NEAR N DEAR

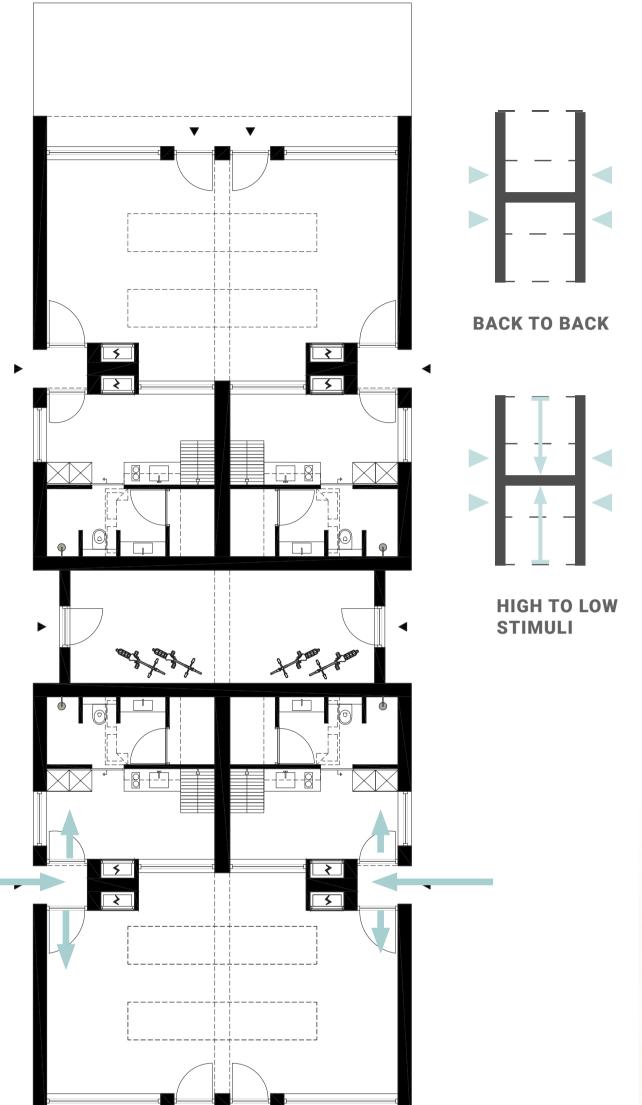
-OUT AND ABOUT

-MAMA'S HOUSE

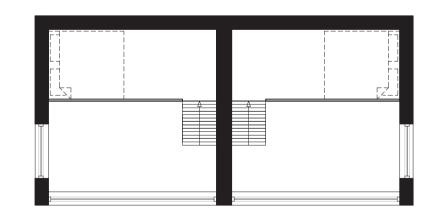
- LOFT STUDIO

# LOFT-STUDIO

SOCIAL INTERACTION AND A CREATIVE MIND.



GROUND FLOOR 25 m² private 45 m² Atelier



FIRST FLOOR

#### THE LOFT:

Is a combination of **25m2** of private space and a shared workshop of **50m2**. From the vein, you walk past the gallery, which gives the ability to showcase your work.

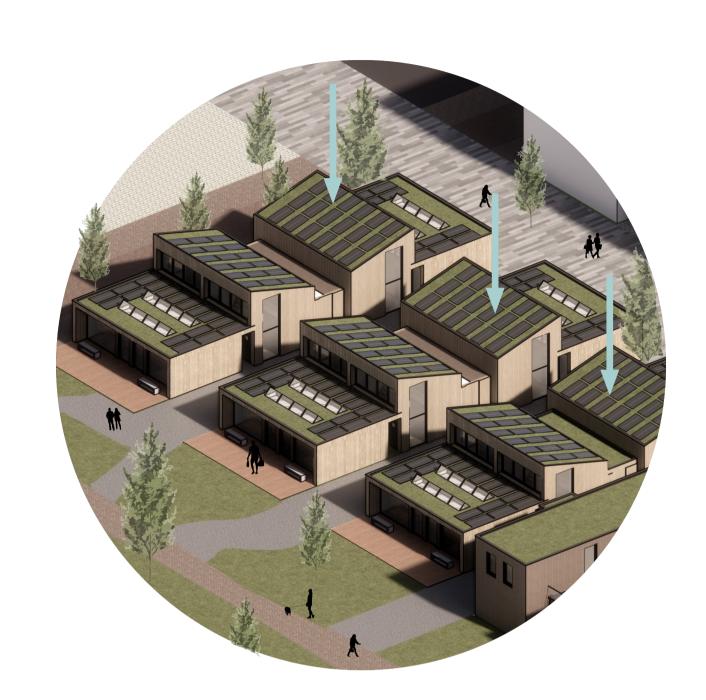
The workshop gives opportunities for organizing workshops or meeting people through the realization of interests and presenting your work.

The eaves overhang creates a real entrance and at the same time shadow for the facade at the south and the ability to regulate the temperature in the atelier.

The program is organized from active to calm. The studio has a loft with a sleeping area and offers a quiet safe place to retreat.

From the studio, you can view the workplace with the option to close it off for complete privacy.

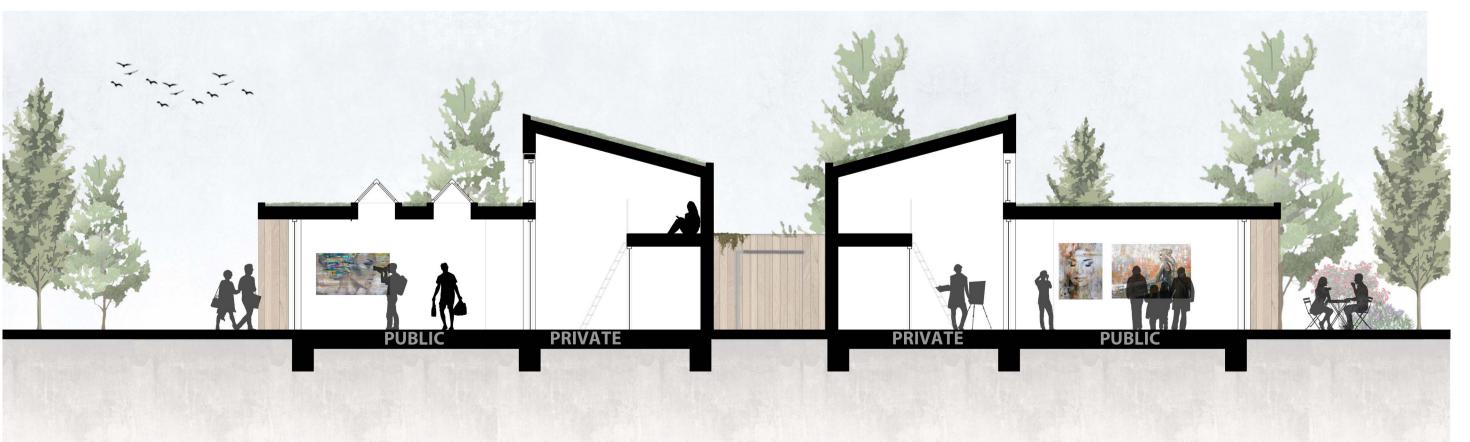
The workshop is designed with two skylights so that light comes from above to create a pleasant work-place. Above the workspace is a nice window to create extra light in the studio





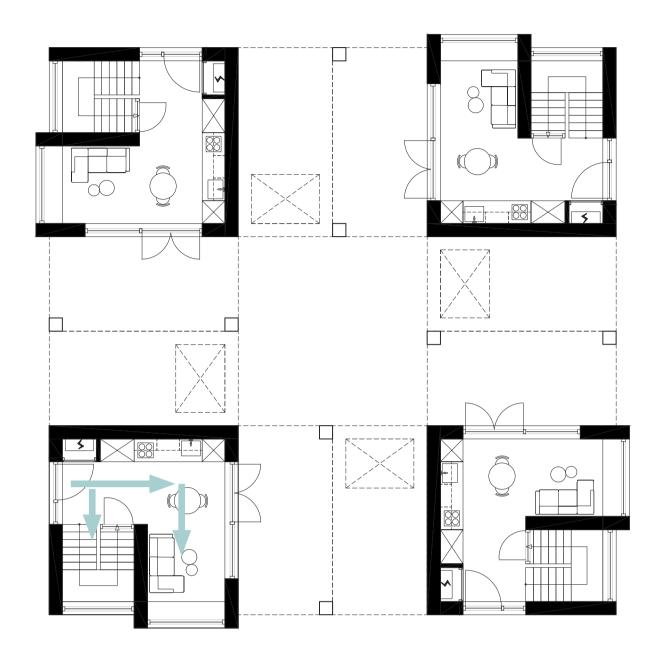




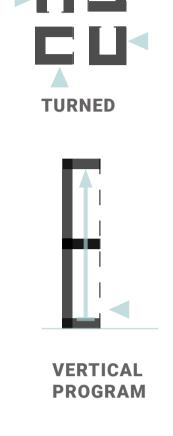


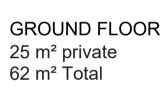
### MILL-HOUSE

COMMUNITY WITH A SENSE OF PRIVATENESS.









FIRST FLOOR 37 m<sup>2</sup> private

#### **MILL-HOUSE:**

Millhouse is a combination of 4 apartments of 62 square meters. Each apartment turns in a 90-degree angle.

This creates a sense of privateness. This offers the opportunity to live independently but also allows interaction with your neighbors. The program in this studio is divided into two floors. On the ground floor, all the active functions are located.

On the second floor are all the quiet activities, including a private retreat with a balcony. I opted for a vertical division in this typology.

The shared patio lowers the threshold to social interaction with your neighbors.

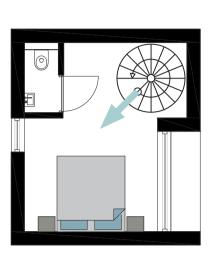


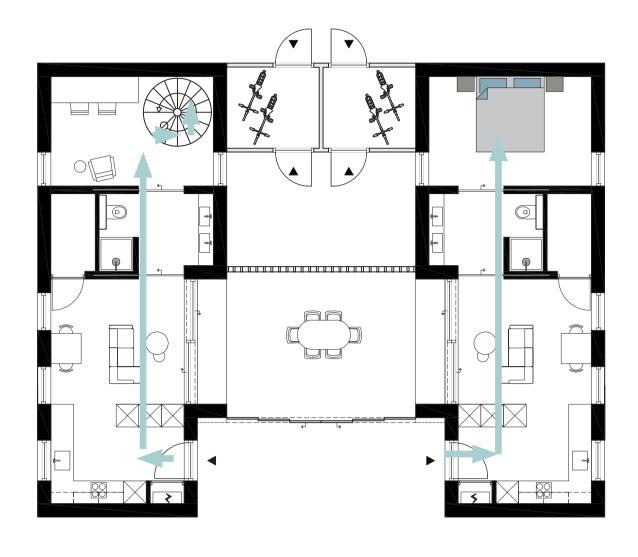


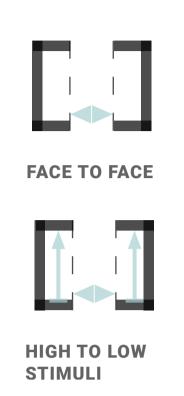


### DEARNEAR

FACE TO FACE HOUSE ORIENTED TO NEIGHBORS.







FIRST FLOOR 25 m<sup>2</sup>

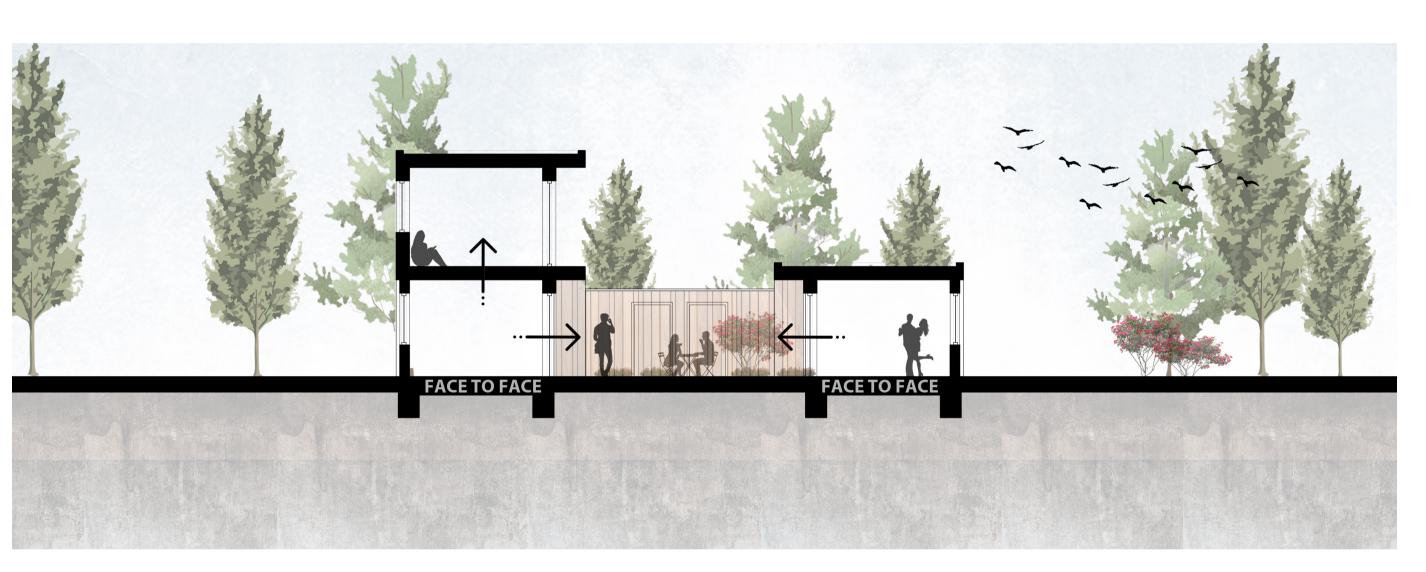
GROUND FLOOR 55 m<sup>2</sup>

#### **DEAR N NEAR:**

Dear n Near is a **face-to-face** layout of **55 square** meters with a horizontal layout from active to calm; this gives autistic people structure in their daily activities. These homes are oriented directly at your neighbors. This creates an intimate courtyard that is partly private. This typology has the option to be layered upon to add extra space; this gives the opportunity to make the program partly vertical. The shared courtyard has the potential to open up to the vein so the residents can decide how much stimuli they allow in.





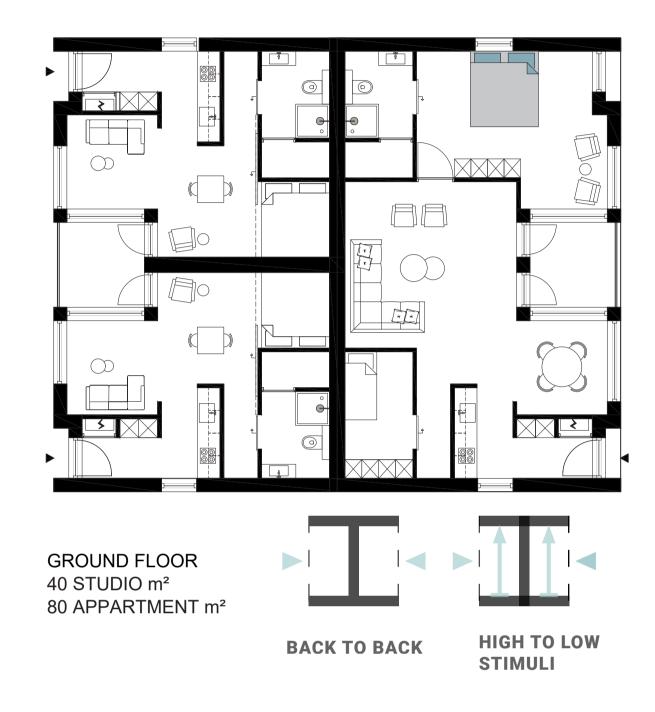




### OUT AND ABOUT

BACK TO BACK LAYOUT ORIENTED AT ENVIRONMENT





#### **OUT AND ABOUT:**

Out and about has a **back-to-back** layout of apartments of **80 square** meters, which have the capability to split up into studios of **40 square** meters each.

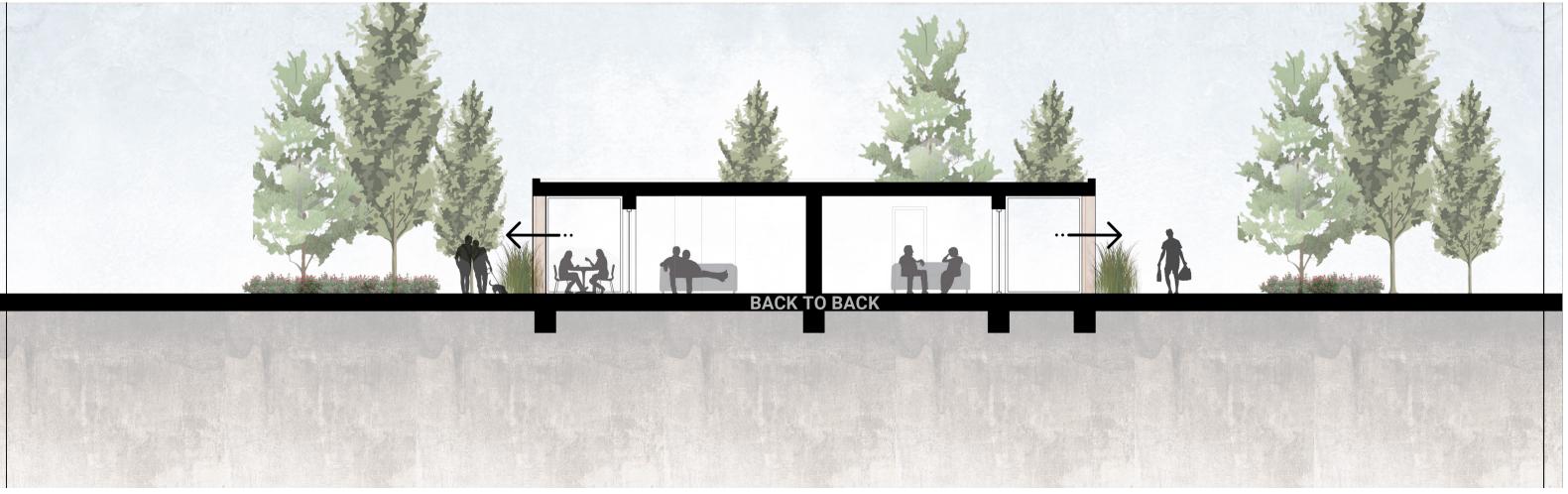
This typology is the opposite of the **face-to-face** layout and grants orientation to the surroundings.

These apartments are designed on horizontal programming to create structure and are also very suitable for differently abled.

The extra outdoor space is an excellent addition to this layout, creating a quiet place to withdraw yourself.

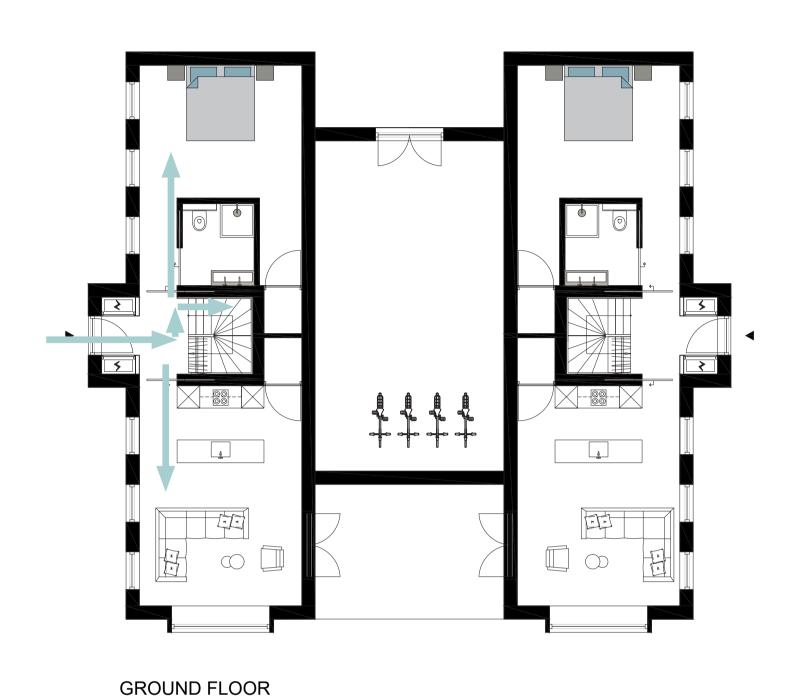






### MAMA'S HOUSE

FAMILY ORIENTED HOMES WITH OPTION TO CARE HOMES







#### **MAMA'S HOUSE:**

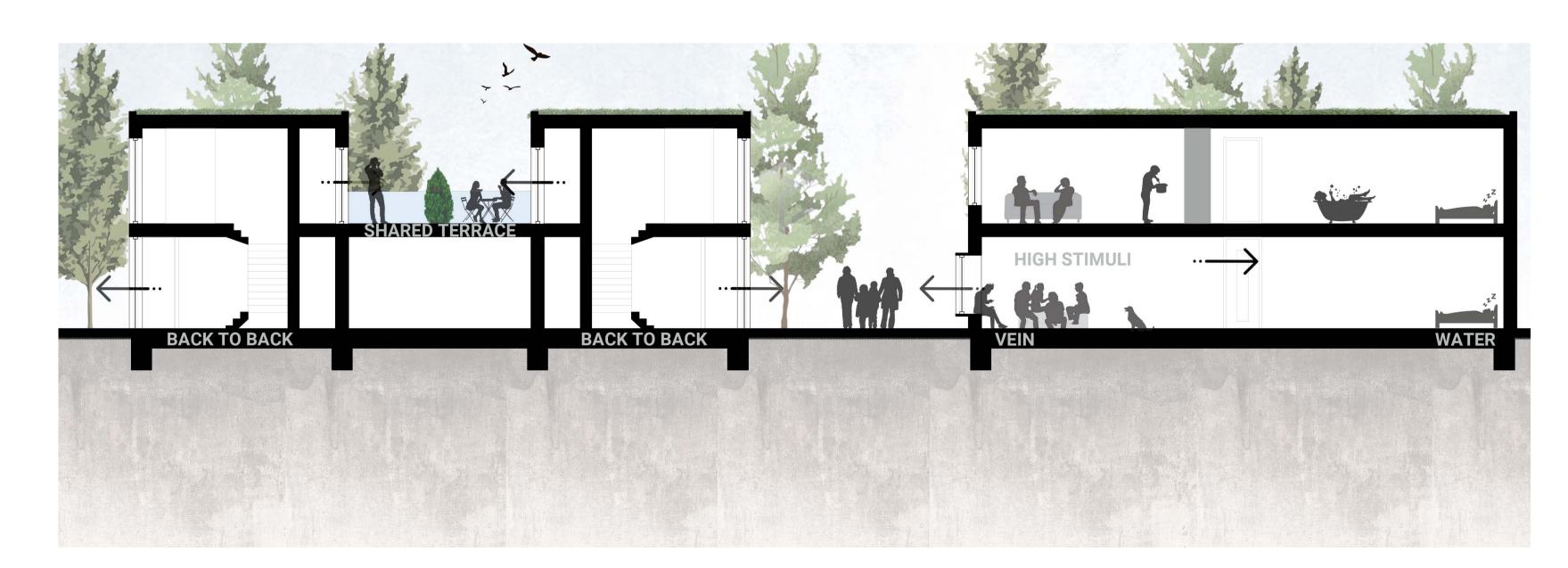
150 m<sup>2</sup> TOTAL

75 m<sup>2</sup> DIVIDED

Mama's House is a family-oriented home of **150 square** meters, which can be divided vertically into apartments of **75 square** meters. This typology lends itself perfectly to a care home, for example, when your adult child wants to move out but still needs assistance in day-to-day life.

This creates a safe living environment with the right amount of privacy. After entering, you can choose whether you go directly to the high or low stimuli

zones. This allows regulating stimuli and is less focused on the structure of the daily rhythm. It offers a shared roof terrace on top of the storage. The storage is transformable into an extra apartment.



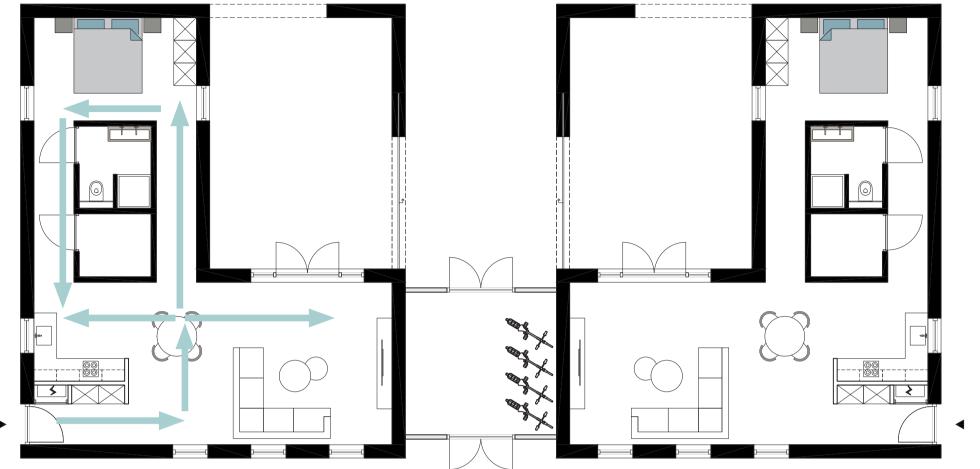






# MEETSTREET

FROM OPEN TO SEMI-OPEN TO CLOSED



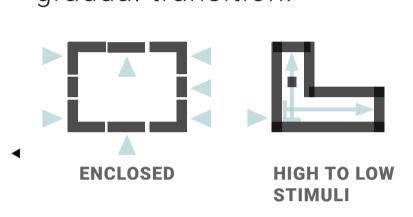
#### **MEET STREET:**

Meet Street are detached houses of **85 square** feet.

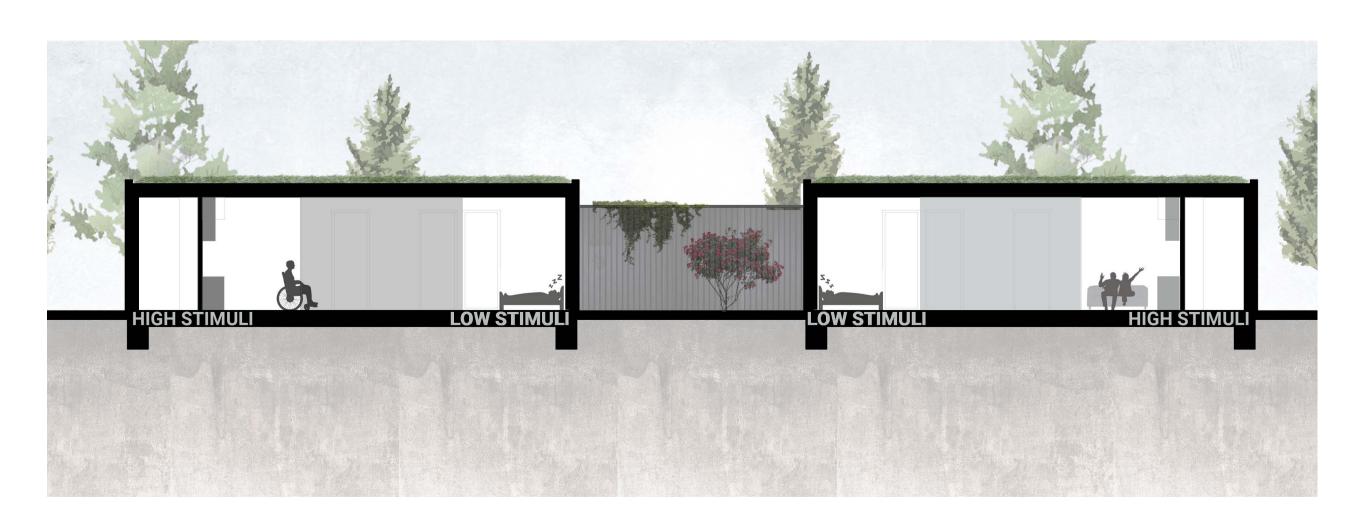
These houses form a small community that can also separate parts to decide if they want to be open, semi-open, or closed.

These houses are designed horizontally where the lavatory creates a buffer zone in which you can circulate. This offers an open layout with enough transition space to create a

gradual transition.





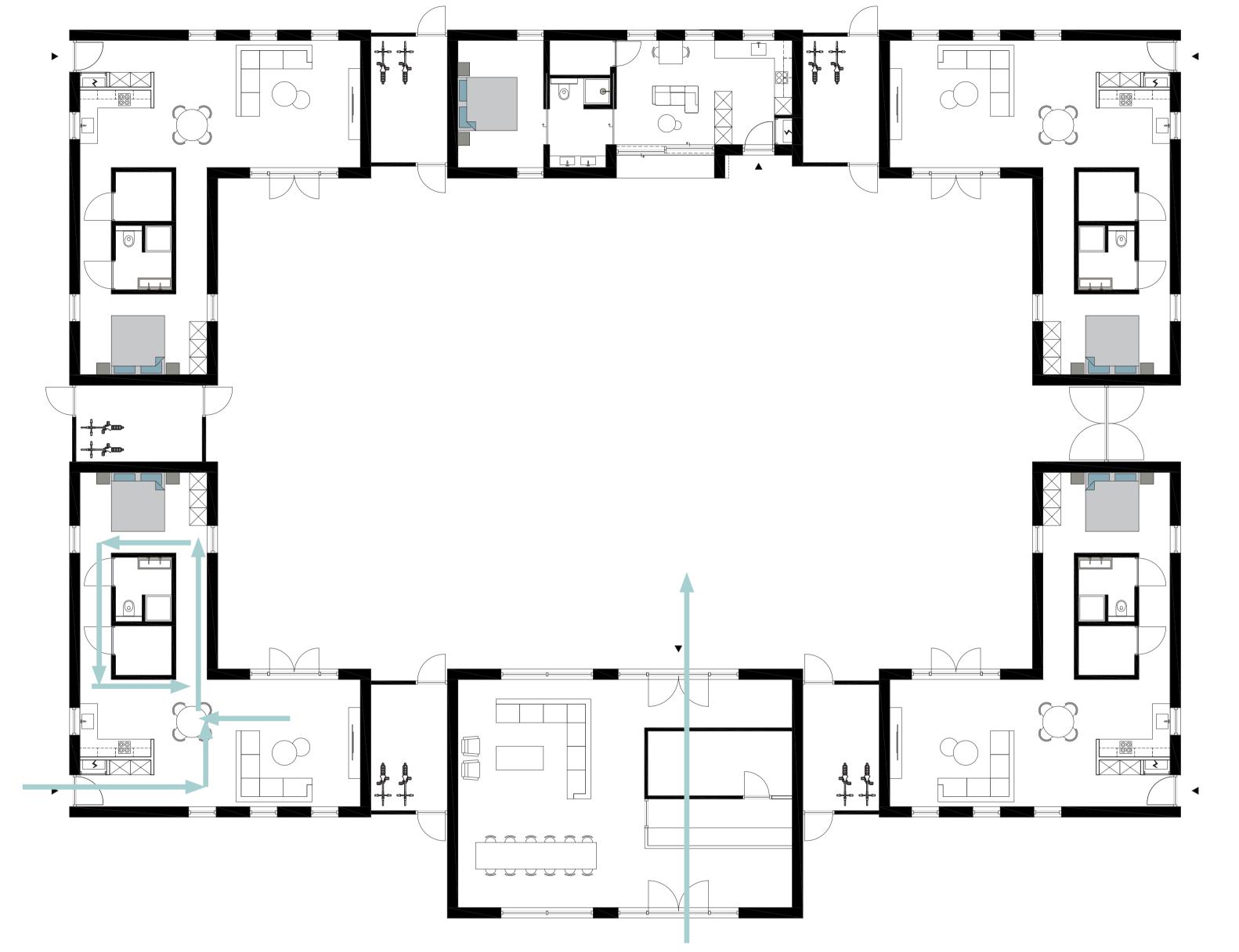


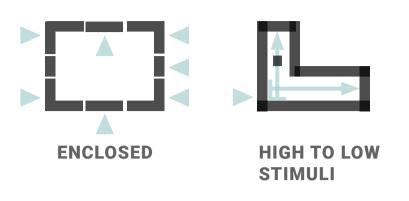


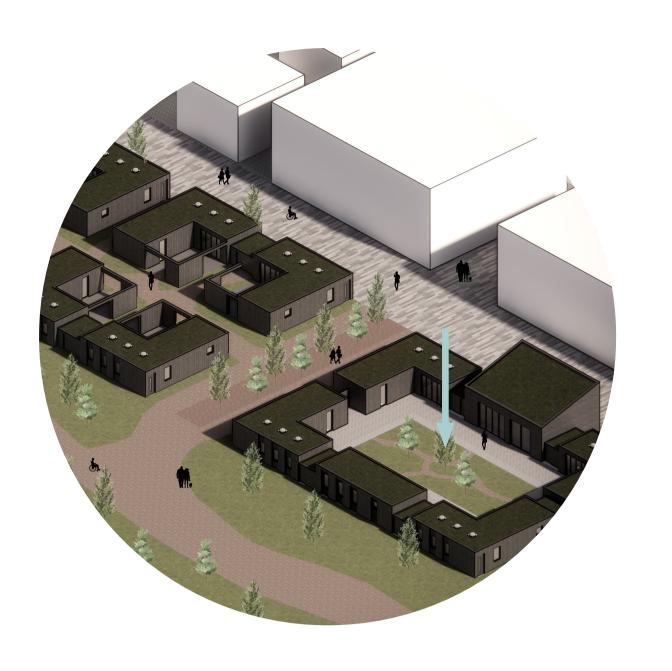


### THEFUSION

A SHELTERED PLACE WHERE THERE IS SO MUCH TO DISCOVER BUT WHERE YOU WILL NEVER GET LOST.







#### THE FUSION:

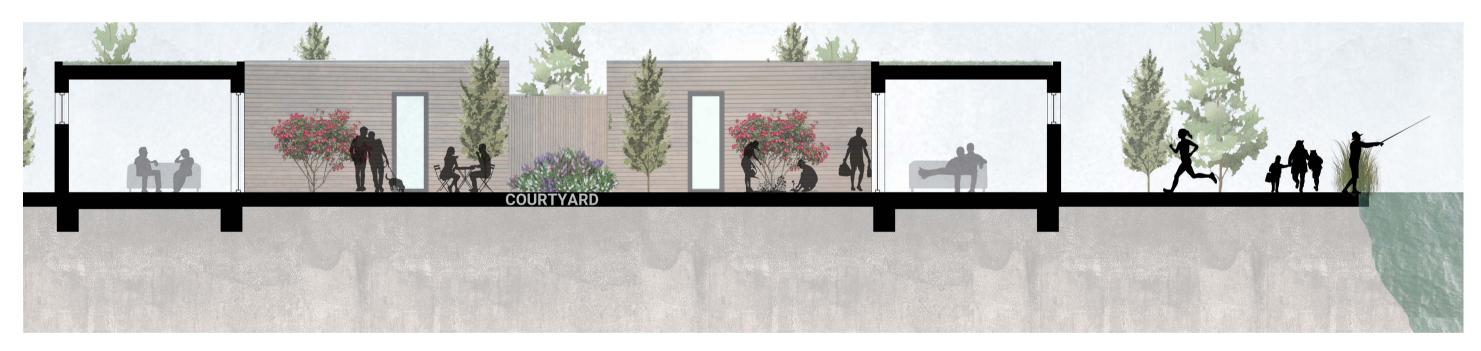
The Fusion is a combination of 5 homes of 85 square meters which

enclose a shared courtyard. This way of living offers security and recognizability.

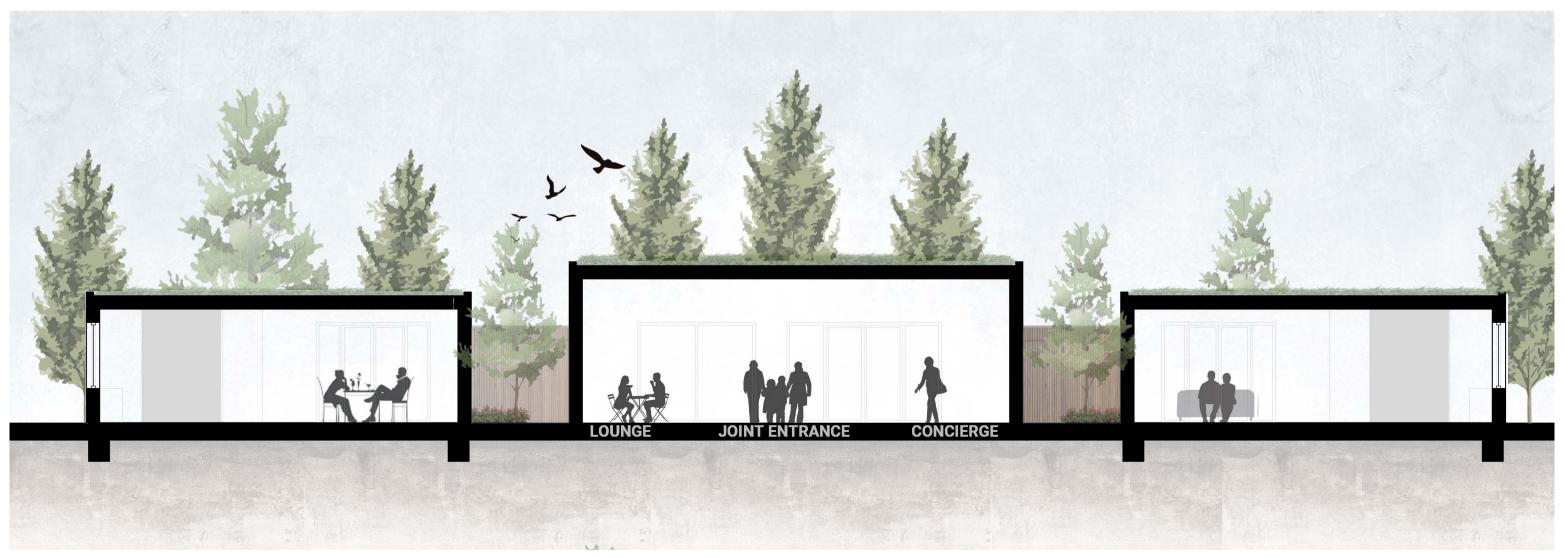
There is a high degree of social contact with your neighbors, however, the courtyard is only accessible to the residents.

There is an entrance hall that functions as a hub where the concierge and delivery point are also located.

The houses also have their own entrances that allow evading the hub if desired. The layout of these homes are structured from active to calm and are mirrored so the low stimuli zones are always directly located next to each other.









# SENSE OF DESIGN

DETAILS AND MATERIALISATION

