

An abstract geometric composition featuring a dense arrangement of various shapes and lines. The elements include circles, squares, rectangles, and triangles in shades of dark red, dark blue, and grey. These shapes are scattered across the page, often connected by thin, horizontal or vertical lines. A prominent vertical line runs down the center of the composition, acting as a central axis. The overall effect is a complex, layered visual structure that suggests a sense of depth and movement.

While Waiting

Master Thesis, Chalmers University of Technology,
Architecture

Agnes Ahlsten



CHALMERS

WHILE WAITING

Master Thesis at Chalmers University of Technology,
Department of Architecture, mparc
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Abstract

Today most of our bus and tram stops are designed and maintained by the multinational company J C Decaux. One standardised model is placed all round our cities, designed with the ambition to provide affordable and easily maintained shelter, seating and with advertising incorporated in the design, (obviously) to pay for it all.

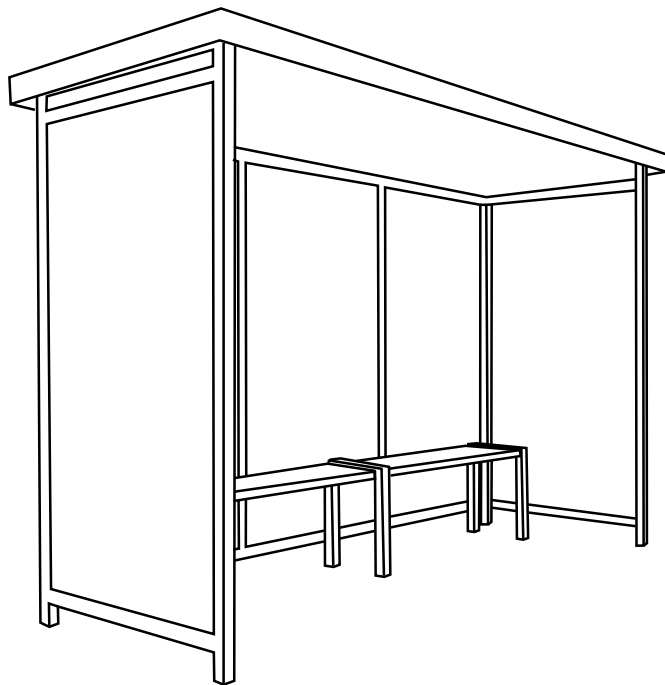
In this thesis I argue that the way we view waiting as time lost (wasted) is also mirrored in the design and that a shift in views, considering waiting as valuable time, would result in a more functional and better design.

People tend to claim they hate waiting yet when asking around people seem reluctant to give it up completely. There seem to be a value in the unproductiveness, the time to reflect. I have studied the waiting, the stress connected to it but also how the unproductiveness can be liberating. The time waiting is actually one of few times in our capitalist society when complete non-action is not frowned upon. I have studied how people use our existing shelters and how we act while waiting resulting in the design principles I have developed and then applied to a site. In considering waiting as valuable time the resulting design is taking not just the function of shelter into consideration but also adding other qualities like stress relief and zoning, making the waiting worth the time.

By designing public transportation stops more consciously we do not only enhance the experience of the city adding 'personality' to our public spaces, but we also attract more people into using public transportation and by that decrease our car dependency. Hopefully this thesis can be a part of a discussion of how we design our common spaces, providing people with an alternative and by that posing the question, in what extent do we want economic reasons to be the main factor when designing our public spaces.

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- If we could would we rather be without waiting?

Introduction

The generic bus- and tram stop designs we see all around our cities showcase, in my view, how low we value time spent waiting. In a commercialised society like ours all time spent non active (non shopping, non working etc.) is considered time wasted. Time waiting on the bus or tram is in that sense time of none or low value and I believe this is mirrored in the design.

"-When I created the first advertising financed shelter, without cost for local authorities, for about 50 years ago, my idea was to solve the following problem: delivering a service to the public transportation system and in the same time rid the public realm of the problem of dilapidated and dirty structures and the over establishment of advertising by renewing and transform it to the lively form qualitative outdoor advertisement can be."
-Jean-Claude Decaux

Jean-Claude Decaux probably had good intentions when starting his company, today delivering outdoor furniture for over 50 cities all around the world and world leading when it comes to outdoor advertising, but maybe the problem had not been a problem if we had been taking care of our common space and if we were to appreciate the activity of waiting in an other way.

Imagine instead what a good and comfortable waiting space could look like, designed not at the lowest cost financed by advertisement, but with regards to the user. Maybe warm with lots of comfortable sitting places and without advertising demanding your attention.

-Waiting is one of the few moments in the modern life when no demands are put on the individual, complete non-action is accepted.

Problematic precedence literature:

The materiality of territorial production

Mattias Kärrholm

The text provides the reader with a framework on how the concept of territoriality can be used in order to understand how public space is used, this is done by enabling the reader to sort territorial claims into different forms of productions (strategies, tactics, appropriations and associations) but also by introducing actor-network-theory. The materiality of a space is by these means introduced as an actant in the complexity that contributes to the territorilisation of a certain space.

Some points worth considering within the work of my thesis:

-That there are several layers that determine how we use public space, the territorilisation depend on more than the territorial strategy of the place, In my case the idea of a waiting space is just one part in determining how the space will be used.

-We can try to make people use the space in a certain way, for example making benches impossible to sleep on avoiding homeless to use them in an unwished way but this decreases the complexity of the territorialisation, eg. making it less complex by reducing possible functions.

-If something too unfamiliar with the specific sort of territory (bus stop) is introduced the perception/territorialisation of the space might change. People might stop identifying the space as a busstop.

-The territoriality of a place is in constant change due to different users territorial tactics and/ or territorial appropriation of it.

-A single function defining a place inevitably also makes it less accessible for all and everyone.

"A place that is officially open to all kinds of people but nevertheless only accessible to a certain category of users (such as cars, bikes, or shoppers) would, of course, also (indirectly) imply restrictions on which people are allowed to be at that place."



Inspirational precedence literature:

Waiting places as temporal interstices and
agents of change

Gunnar Sandin & Mattias Kärrholm

"Public waiting places are today increasingly becoming pre-programmed: connected to other designed environment and integrated into a consumers context, thus losing part of their traditional role in the public domain as places for waiting."

In this article Sandin and Kärrholm argues that the function waiting spaces play as in-between time-spaces can be viewed as actants, they can have a transformative role. They are arguing that there is a quality being lost as waiting places increasingly is considered to be a part of a consumers landscape rather than rendering the waiting itself productive.

They are also introducing four different modes of waiting ordered to diminishing degree of stabilisation, the waiter's perception of control:



Settled:

A mode of high stabilisation, whereas the endpoint of waiting is seen as in control of the waiting subject. This could for example be a coffee break or waiting to finish ones cigarette. A break where the subject is not waiting for anything apart from the waiting effect itself.



Pre-settled:

A mode with lower degree of stabilisation the waiting subject is subordinated a larger system, which she cannot control herself, yet with a clear idea of for how long the waiting will approximately be. The endpoint is pre-scheduled. This mode of waiting could be for example waiting for the bus, your flight or a doctor's appointment.



Unsettled:

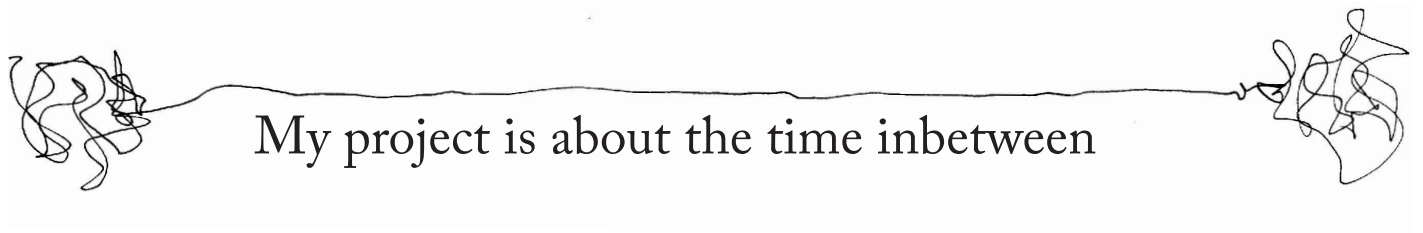
The pre-scheduled stability of the pre-settled mode is for some reason unhinged, the waiting is unsettled but expected to settle. The waiting subject is exposed to some frustration due to the unpredictability of the situation. This could for example be when your flight is postponed until further notice or when you are stuck in a traffic jam.



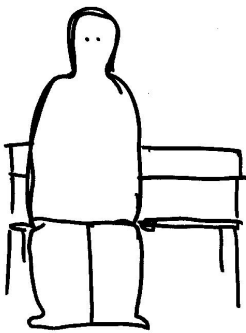
Non-settled:

The mode with the lowest degree of predictability and does not take place during what we would call everyday urban life a state of out-of-the-ordinary. It is a state which could be identified as chaotic where the predictability is low or non existing. This could for example be during riots, war or natural disasters, whereas the waiting subject has no control of the uncontrolled series of events she is exposed to.

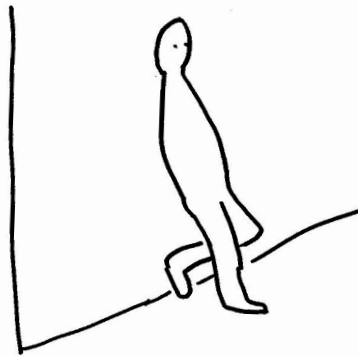
Early sketches



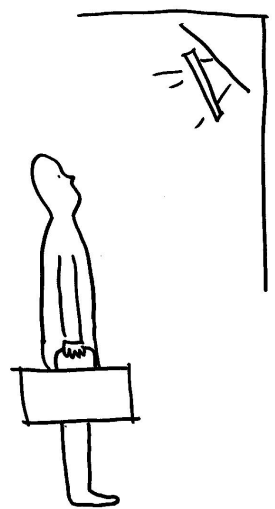
Actions intuitively connected to waiting at bus- and tram stops:



to sit

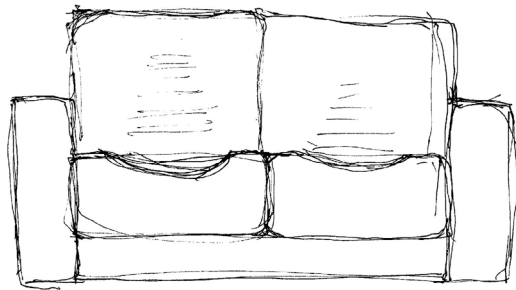


to lean



to search info

While waiting,
do we always prefer to sit?



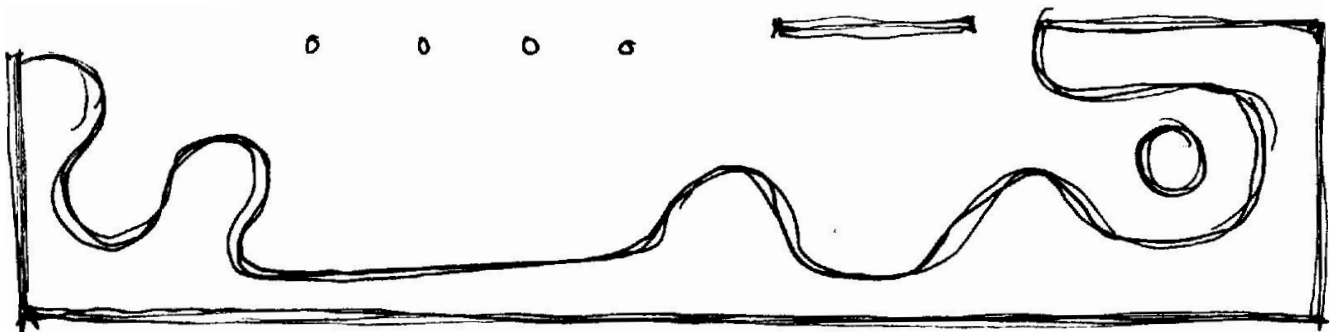
Designing for the different modes:

settled

pre-settled

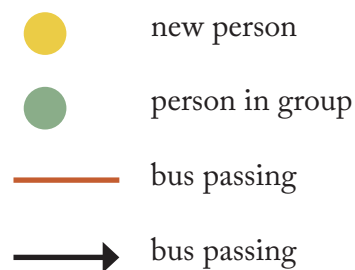
un-settled

non-settled

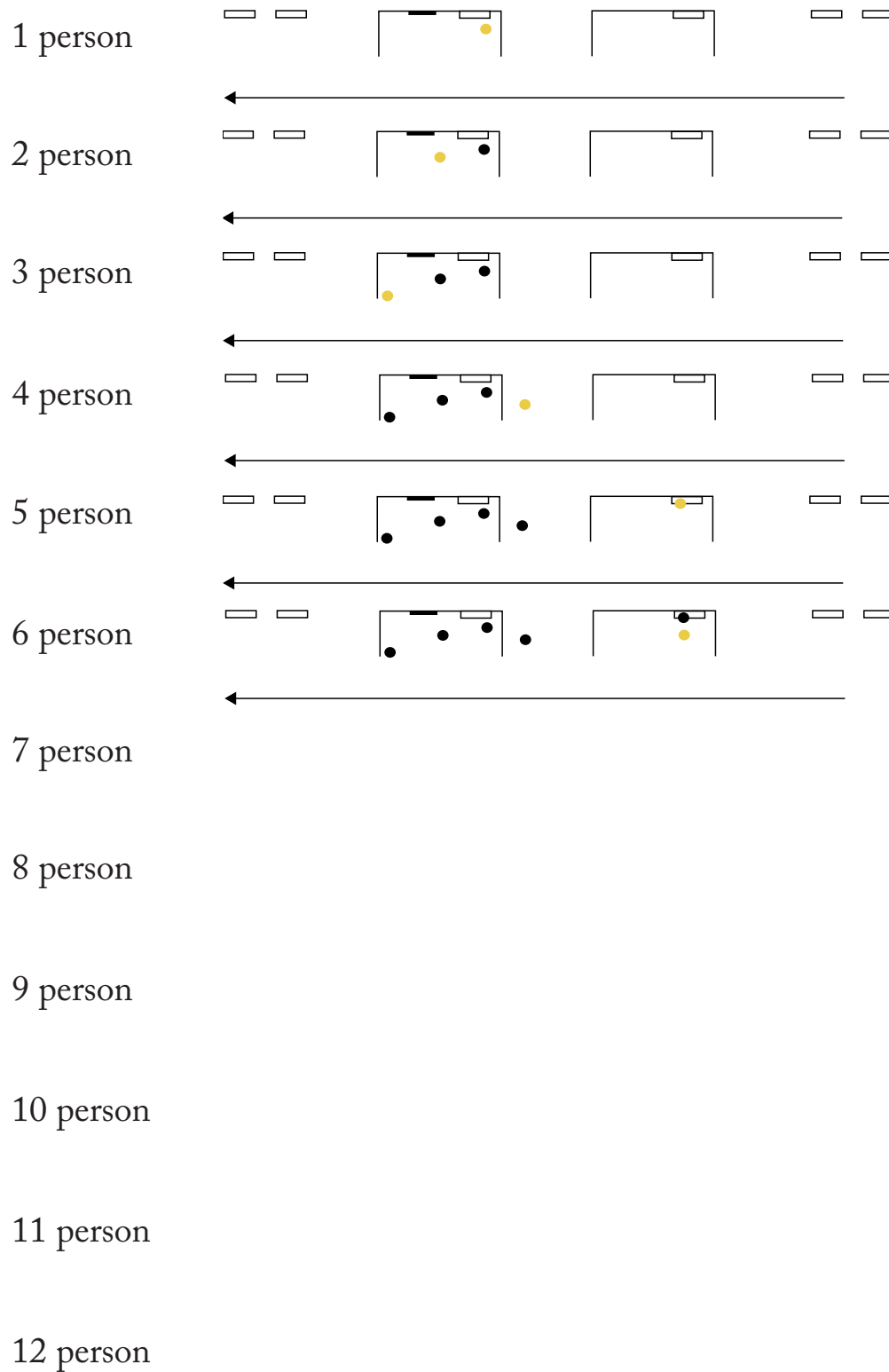


Physical evidence

The physical evidence is based on observations of three different bus- tram stops of different sizes around Gothenburg. The first two are positional studies where it was observed how people positioned themselves at the bus stop in relation to others. The third study has a focus on movement in addition to positioning/territorialisation. This study is different in the sense that it is not divided into clear situations but as a flow mainly due to the fact that this study was made at a slightly bigger bus stop and it was therefor never completely empty of people, it was rather a constant flow of people coming and going.



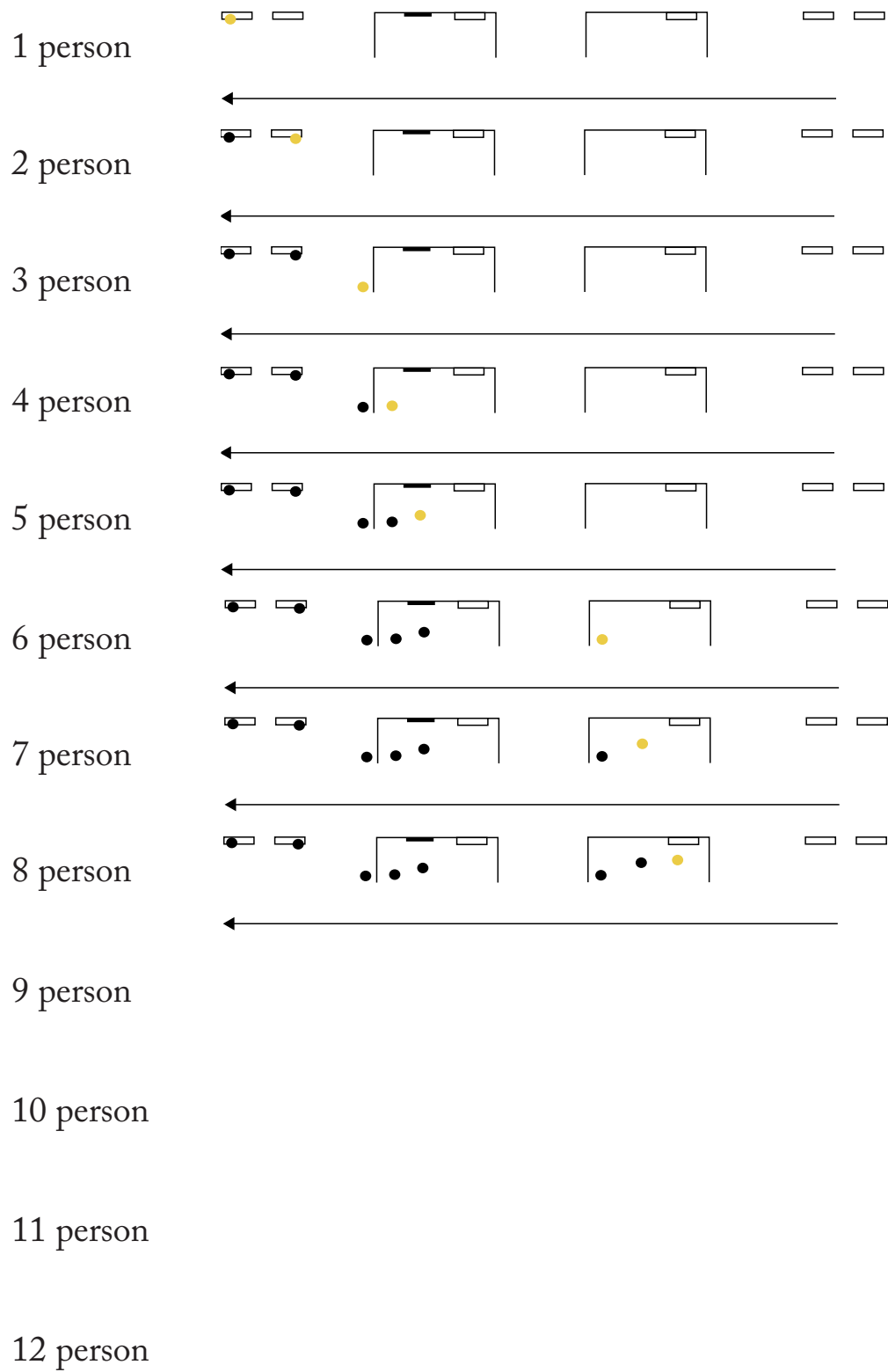
Situation A



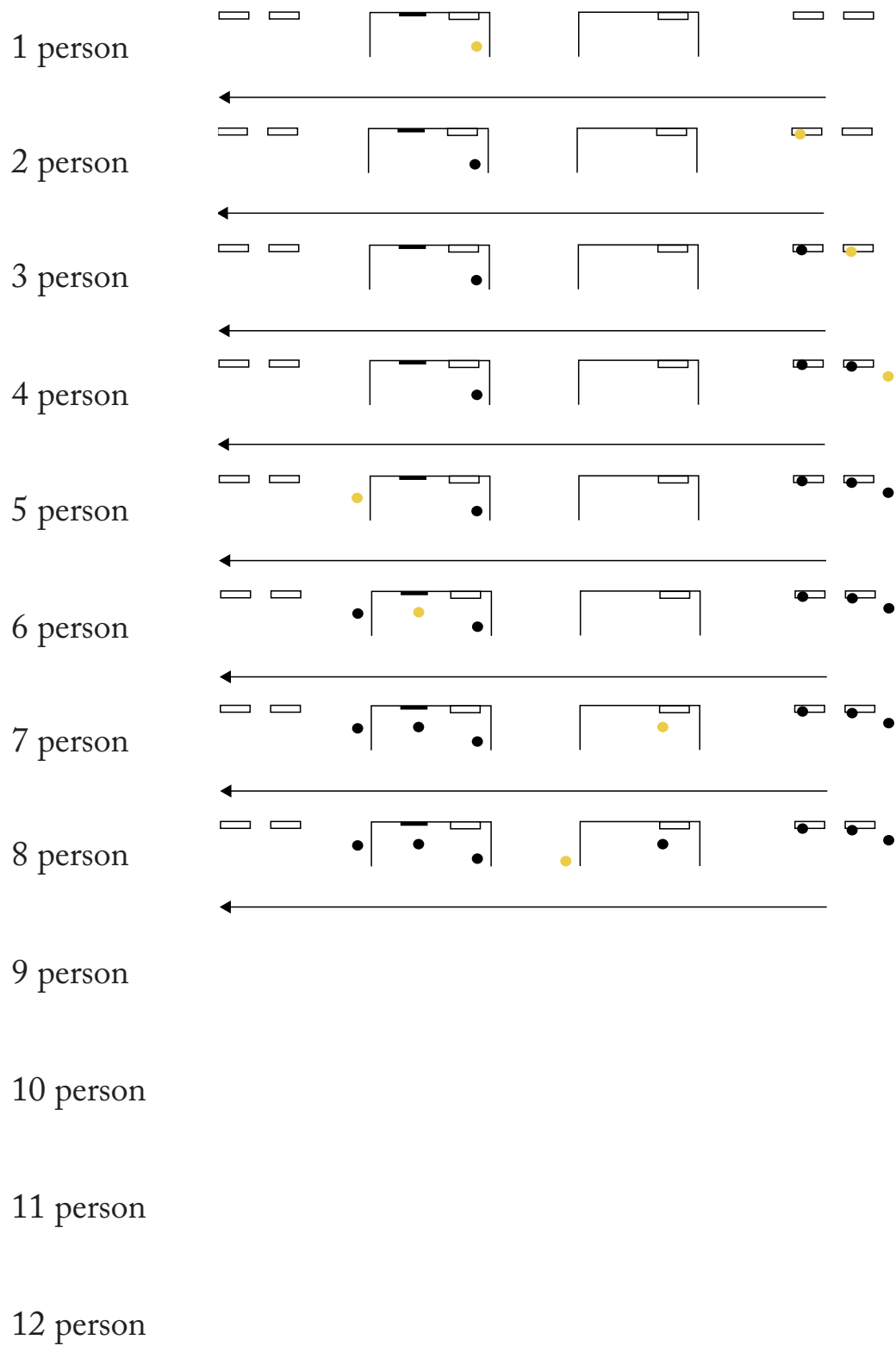
Olivedalsgatan

-positional study at the bus- & tram stop
Olivedalsgatan (läge B), Gothenburg.

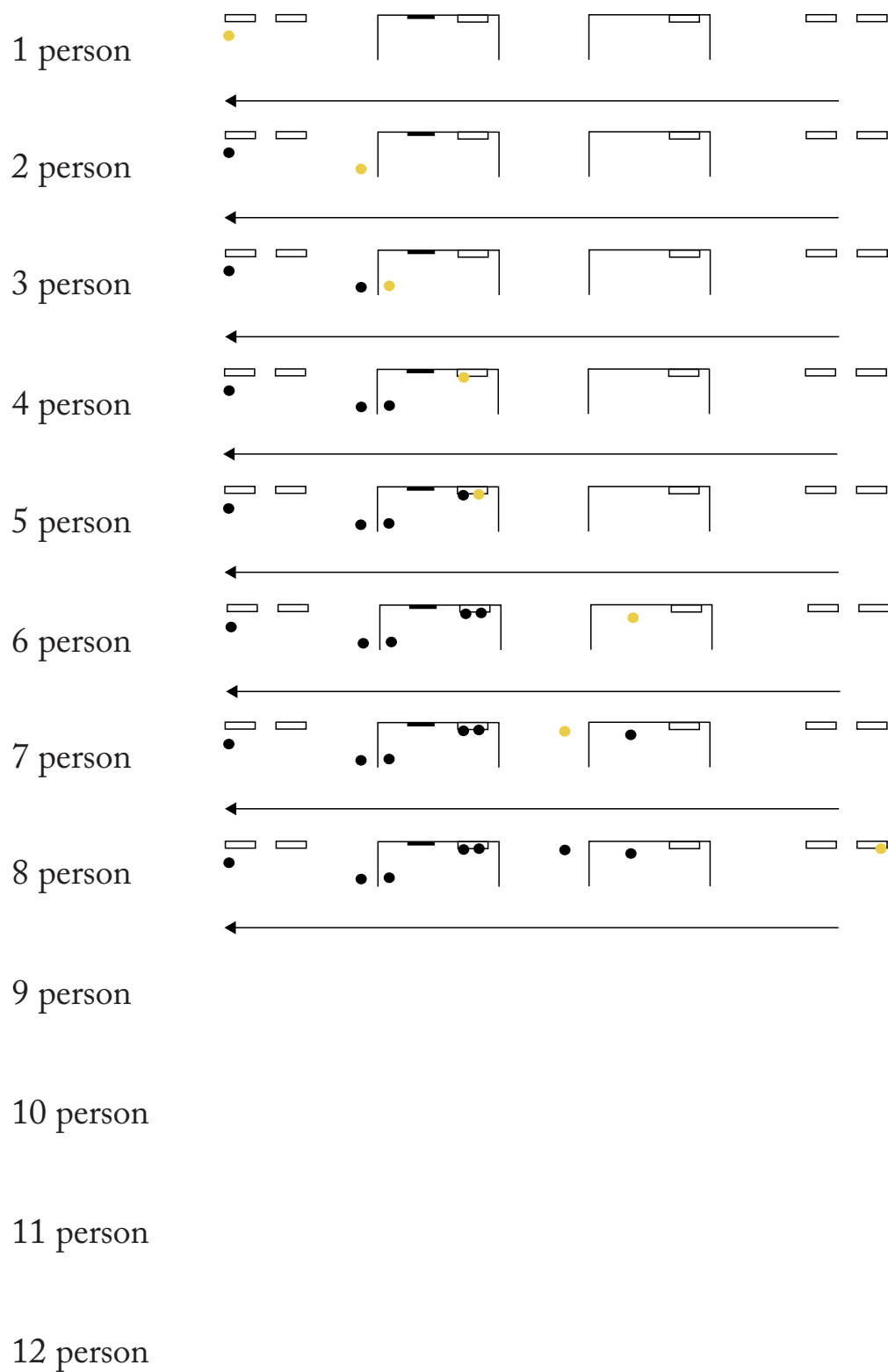
Situation B



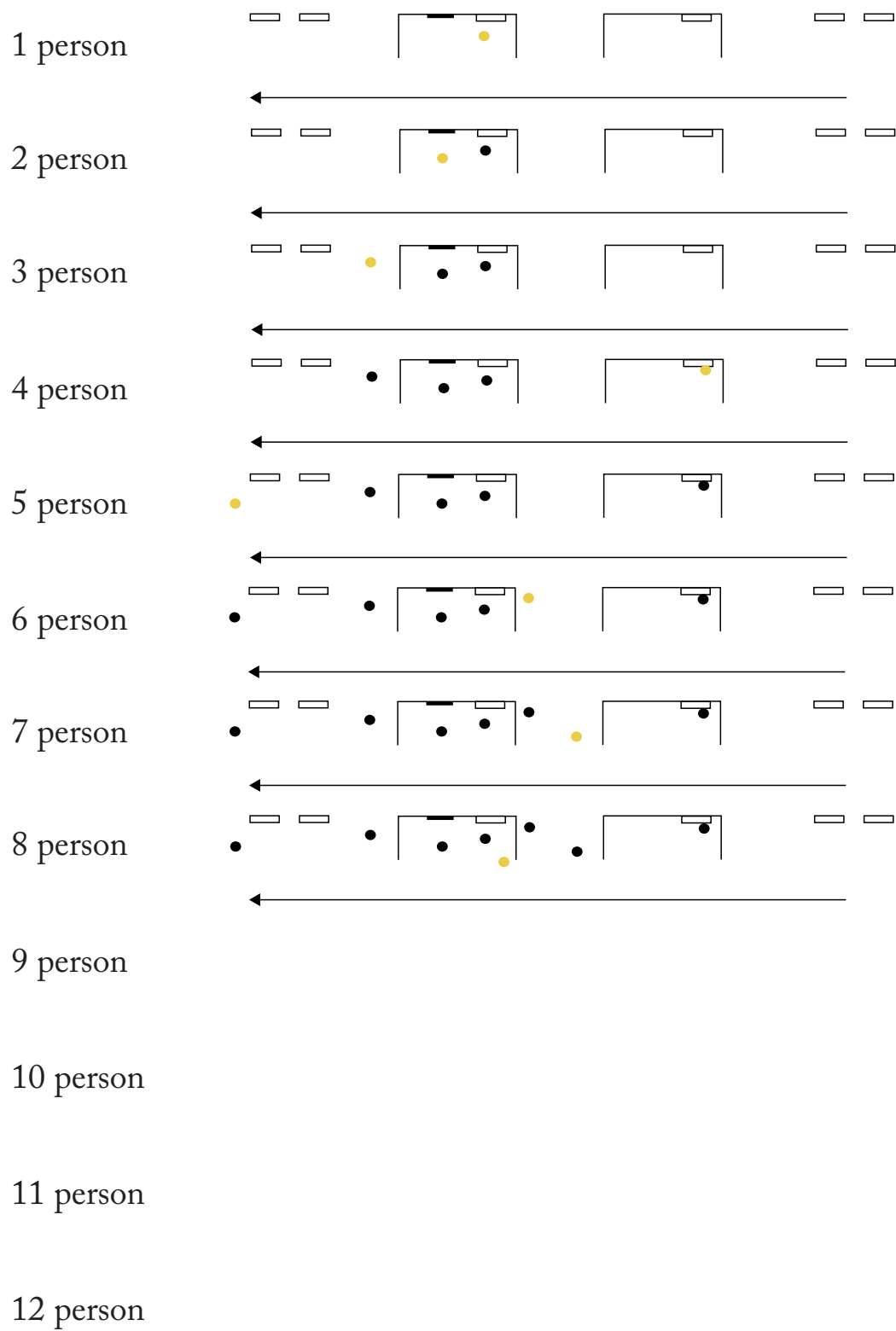
Situation C



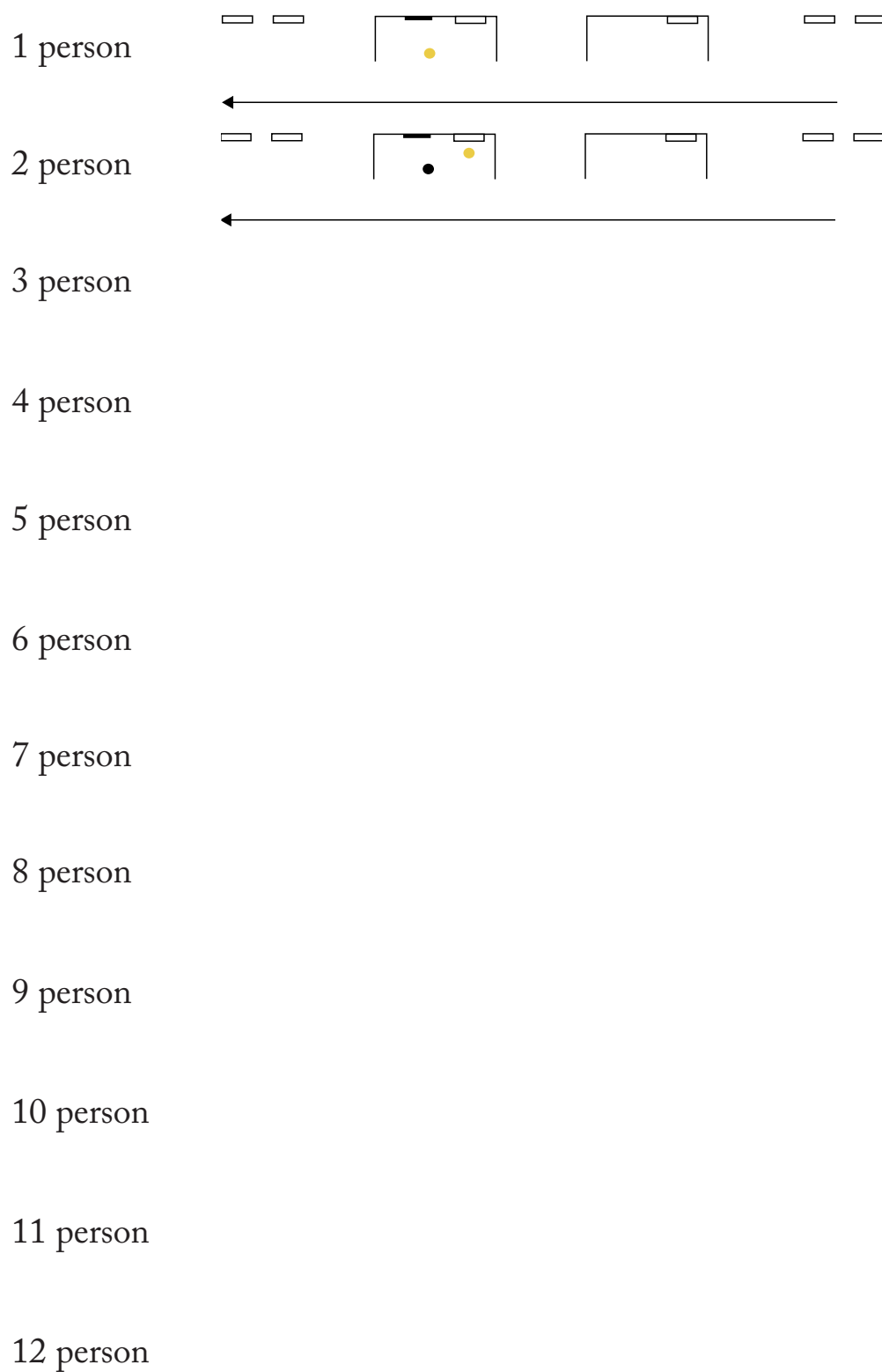
Situation D



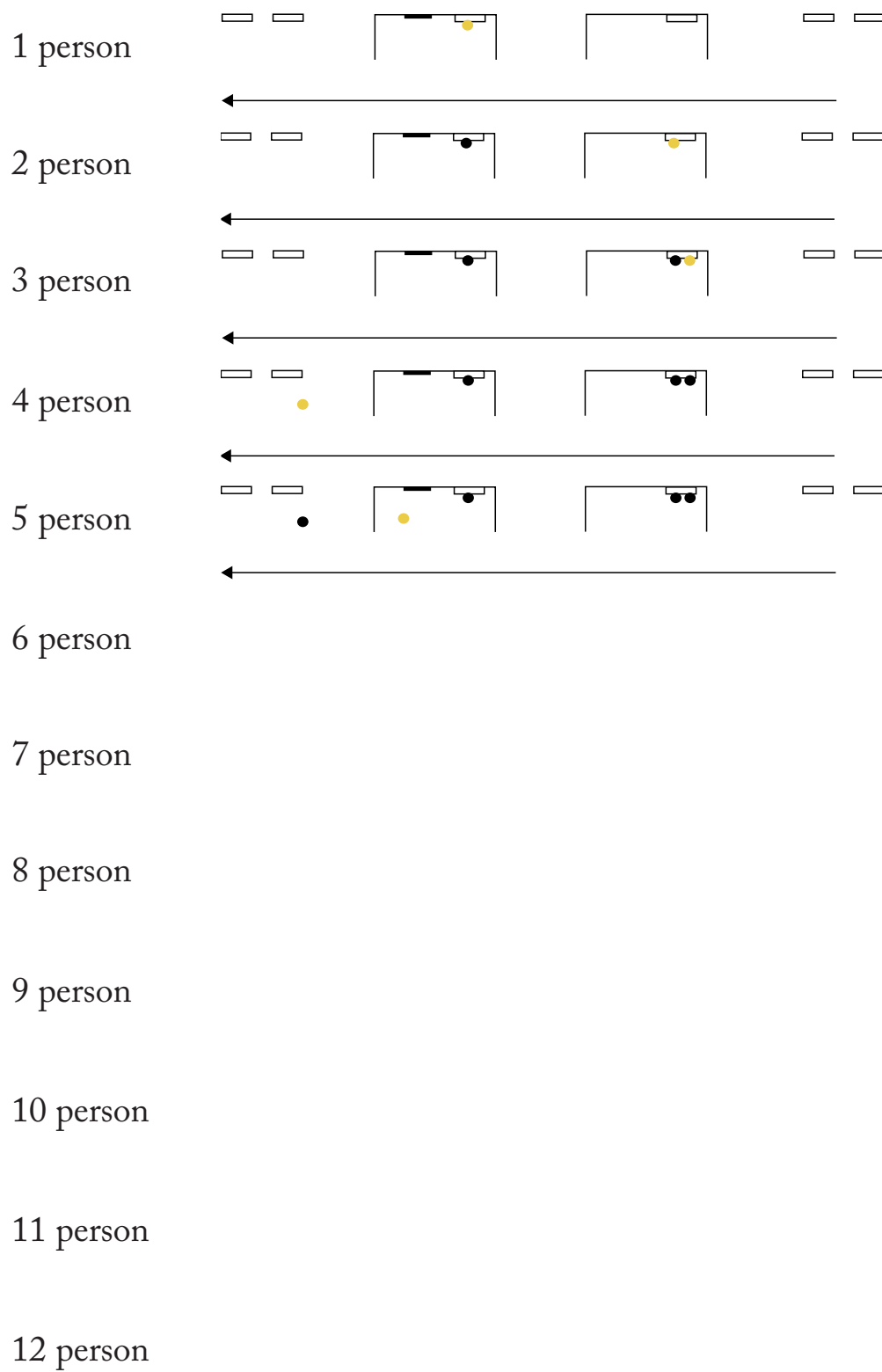
Situation E



Situation F

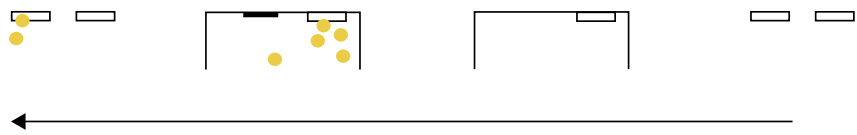


Situation G

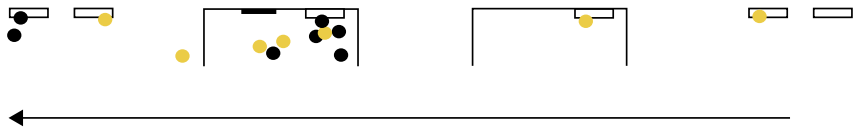


Olivedalsgatan

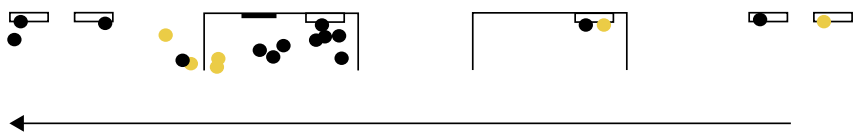
1 person



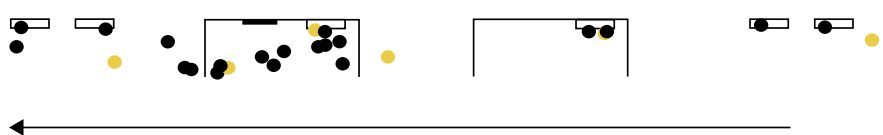
2 person



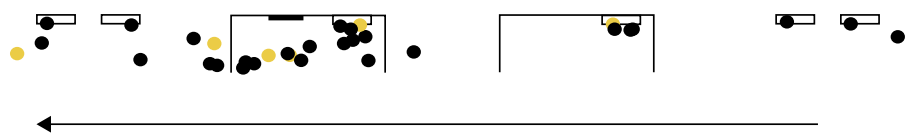
3 person



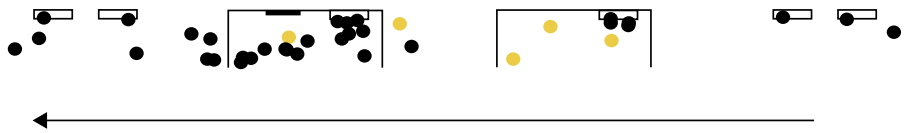
4 person



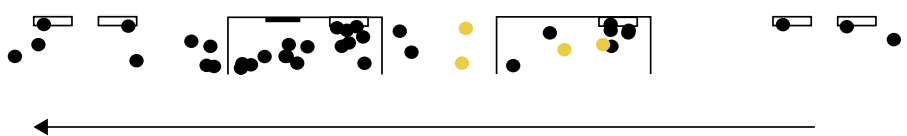
5 person



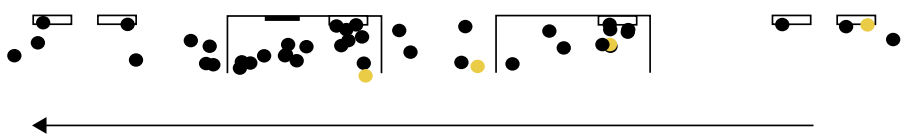
6 person



7 person

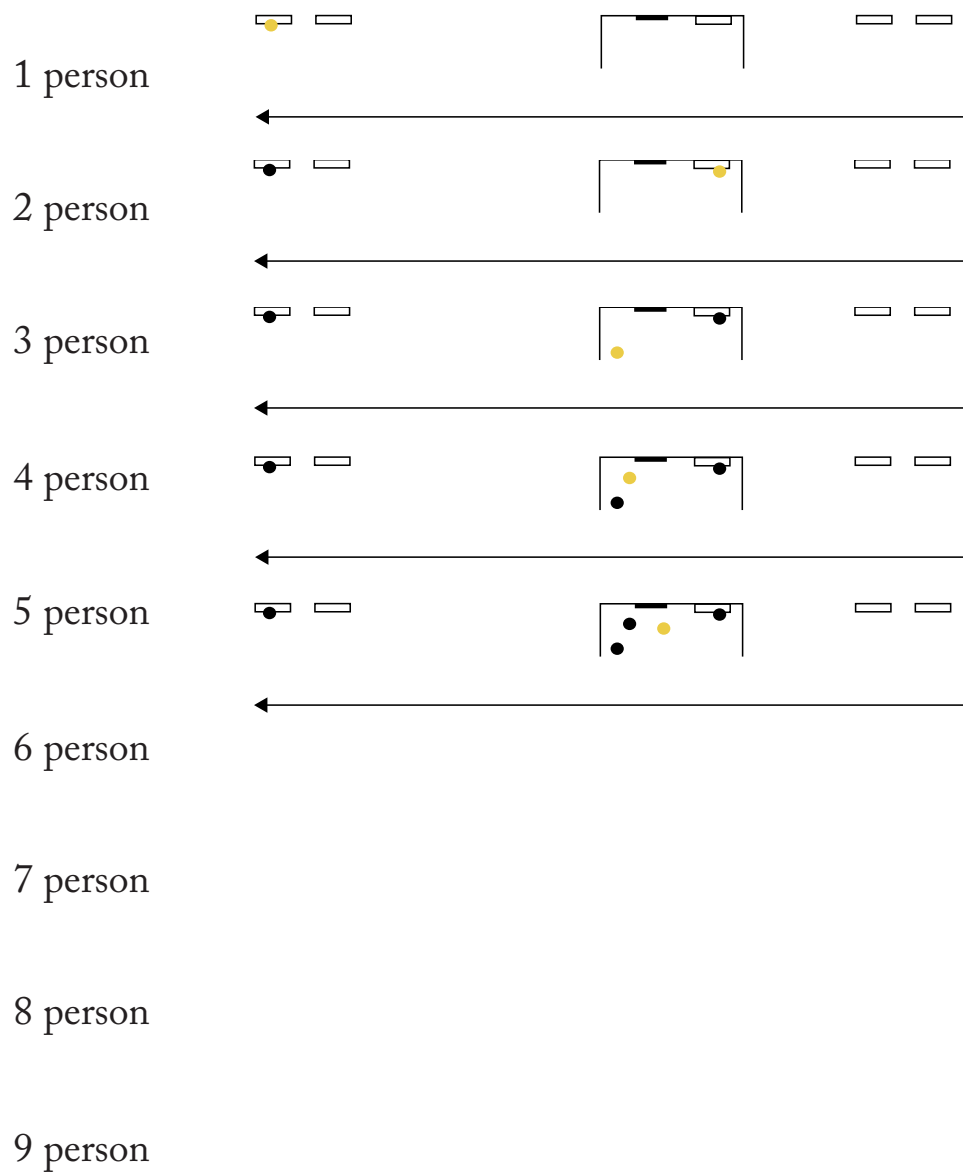


8 person



-Positional study of the bus- & tram stops
Olivedalsgatan (läge B) Showcasing all situations
ontop of each other.

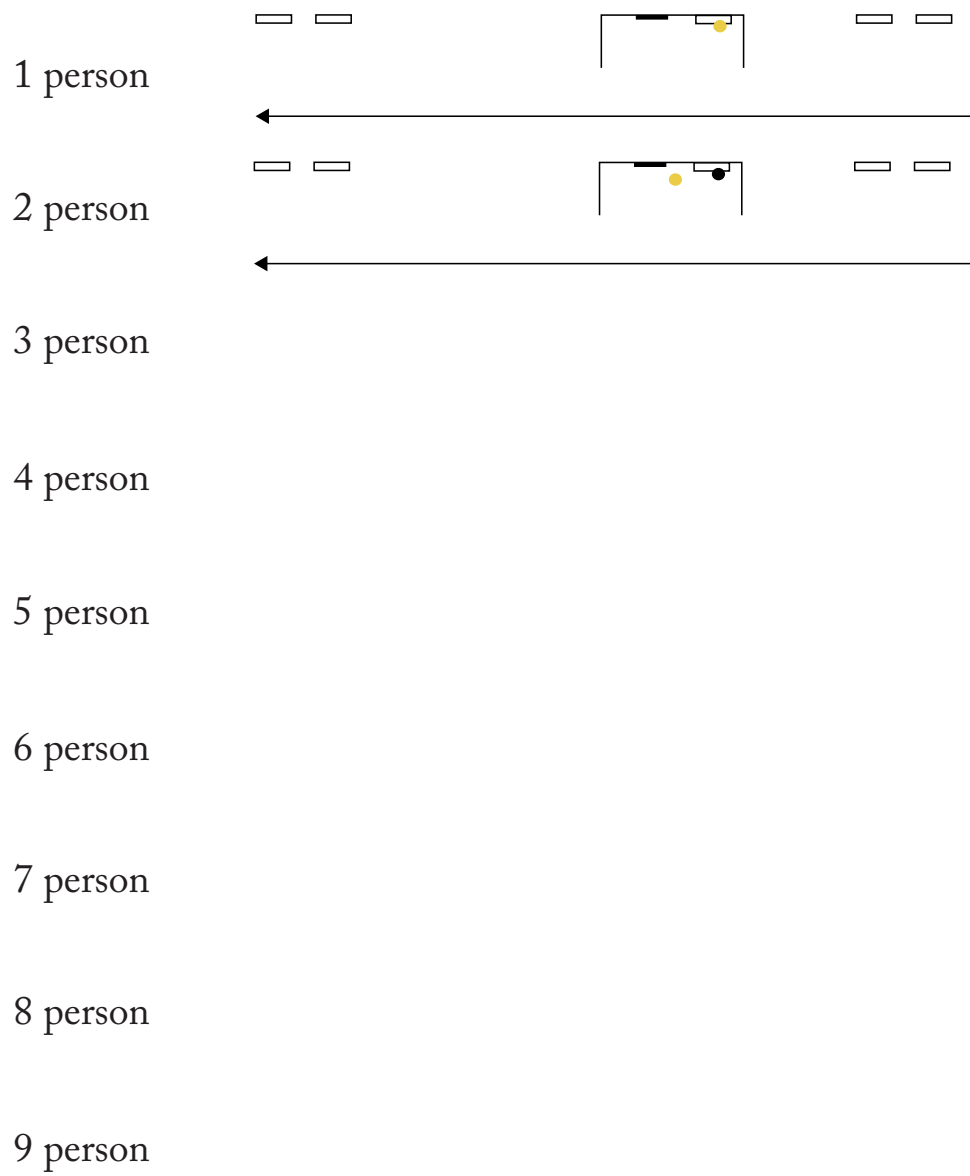
Situation A



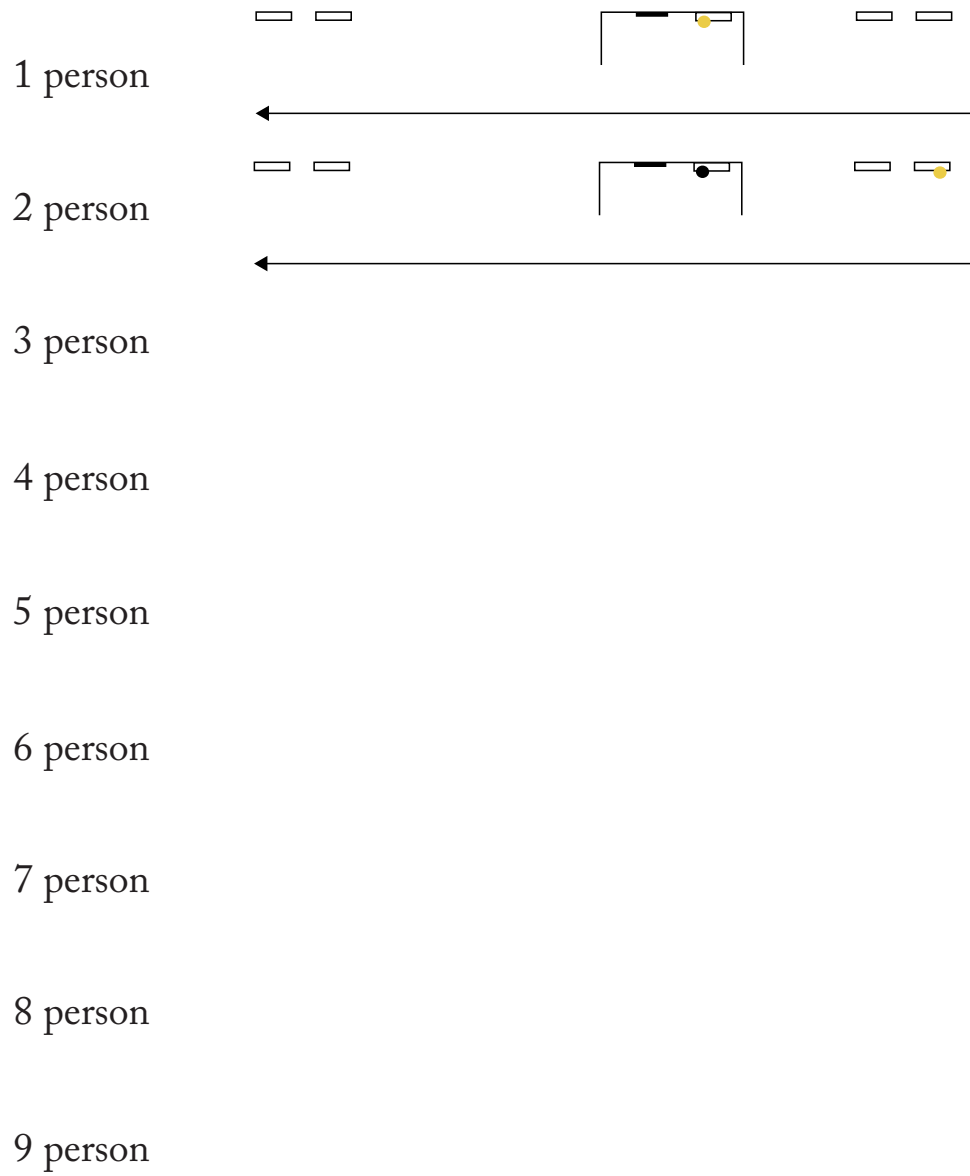
Hagakyrkan

-positional study at the bus- & tram stop
Hagakyrkan (läge A), Gothenburg.

Situation B

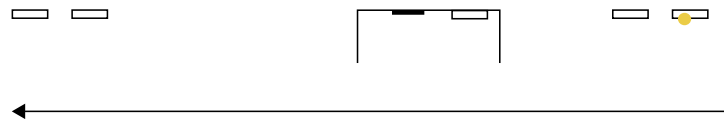


Situation C

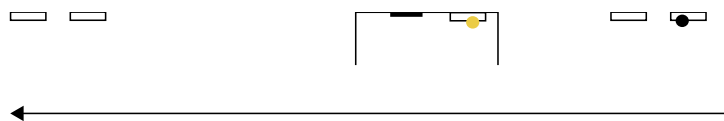


Situation D

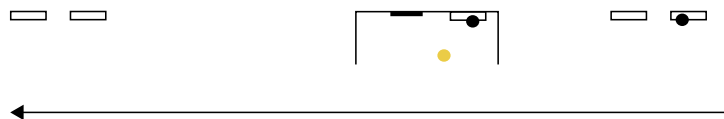
1 person



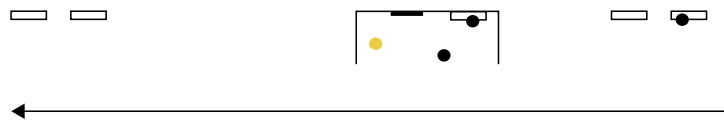
2 person



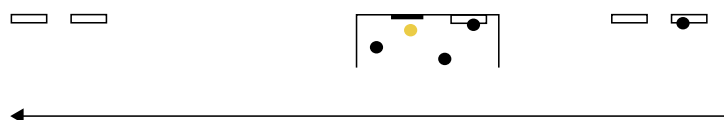
3 person



4 person



5 person



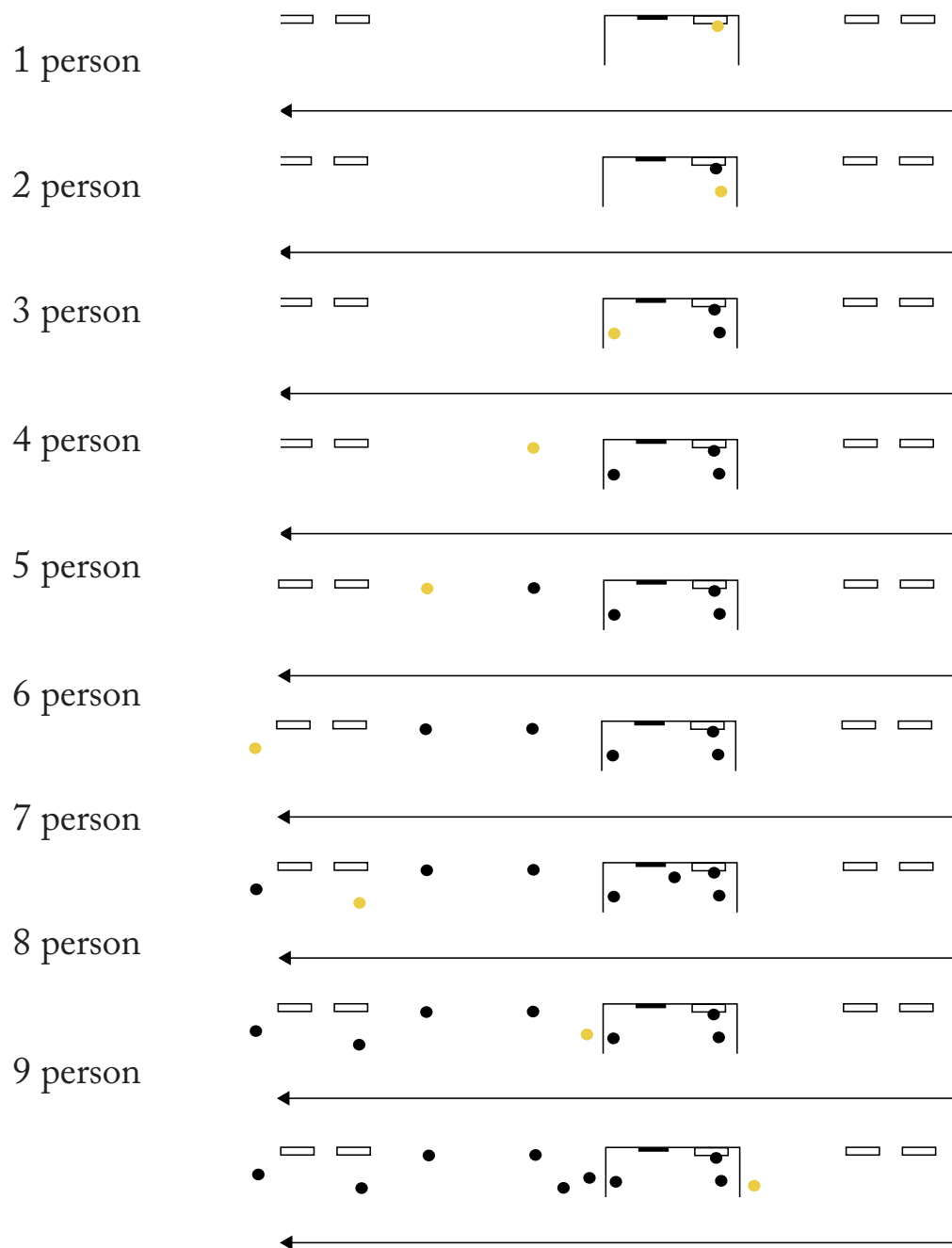
6 person

7 person

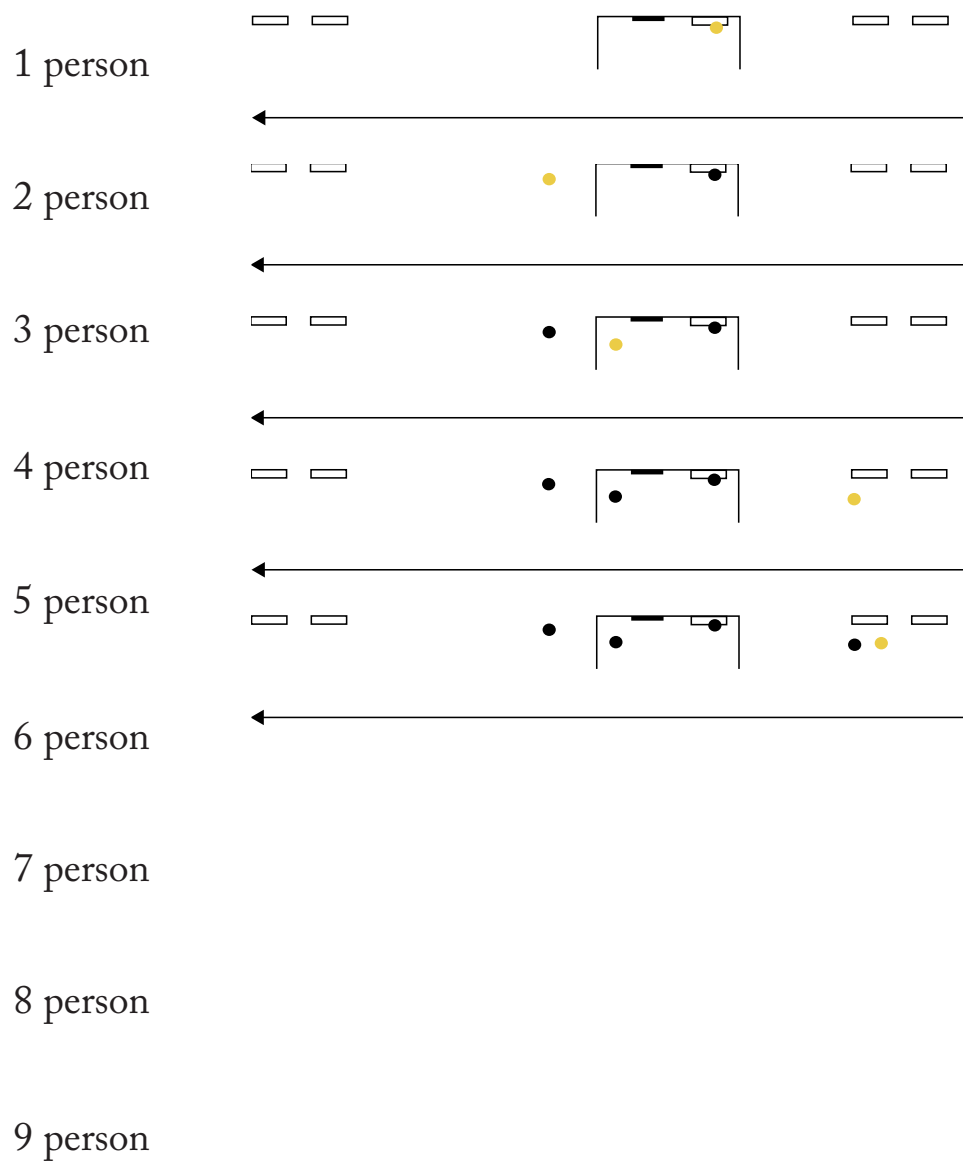
8 person

9 person

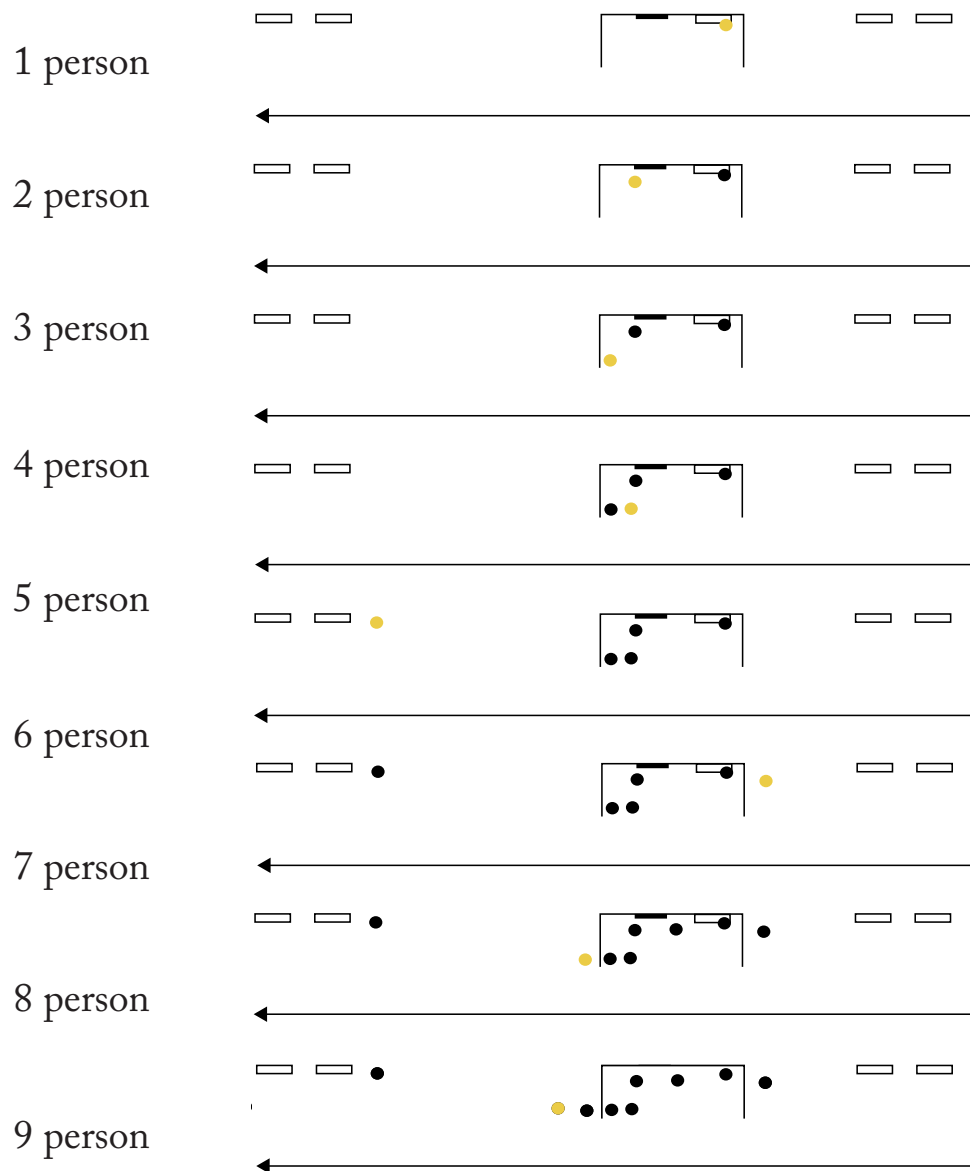
Situation E



Situation F

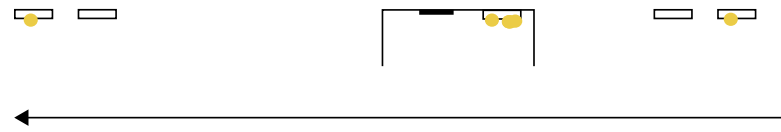


Situation G

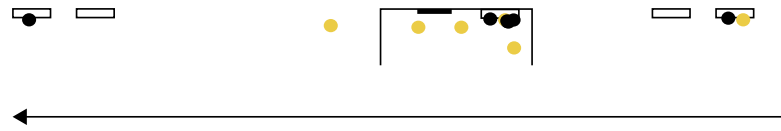


Hagakyrkan

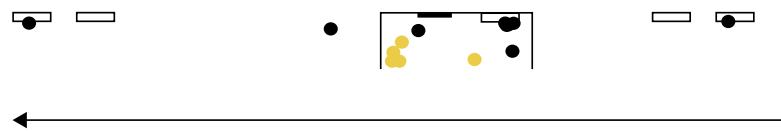
1 person



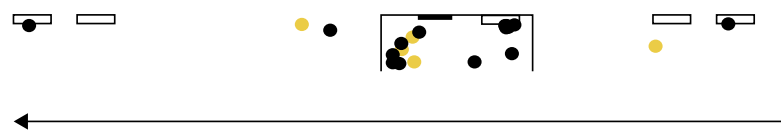
2 person



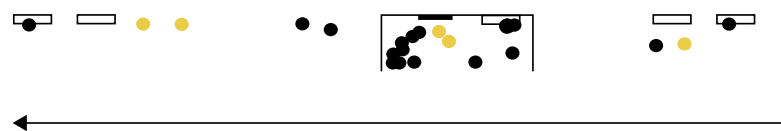
3 person



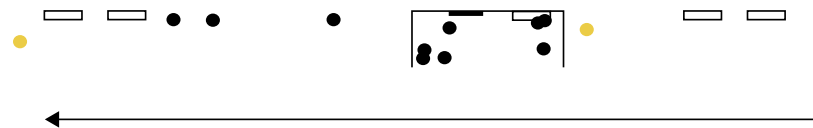
4 person



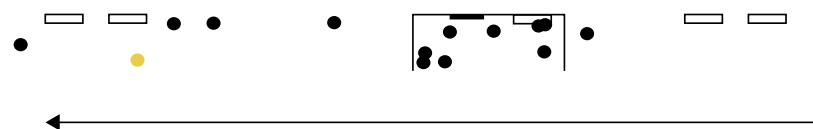
5 person



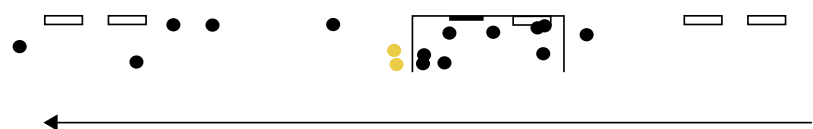
6 person



7 person

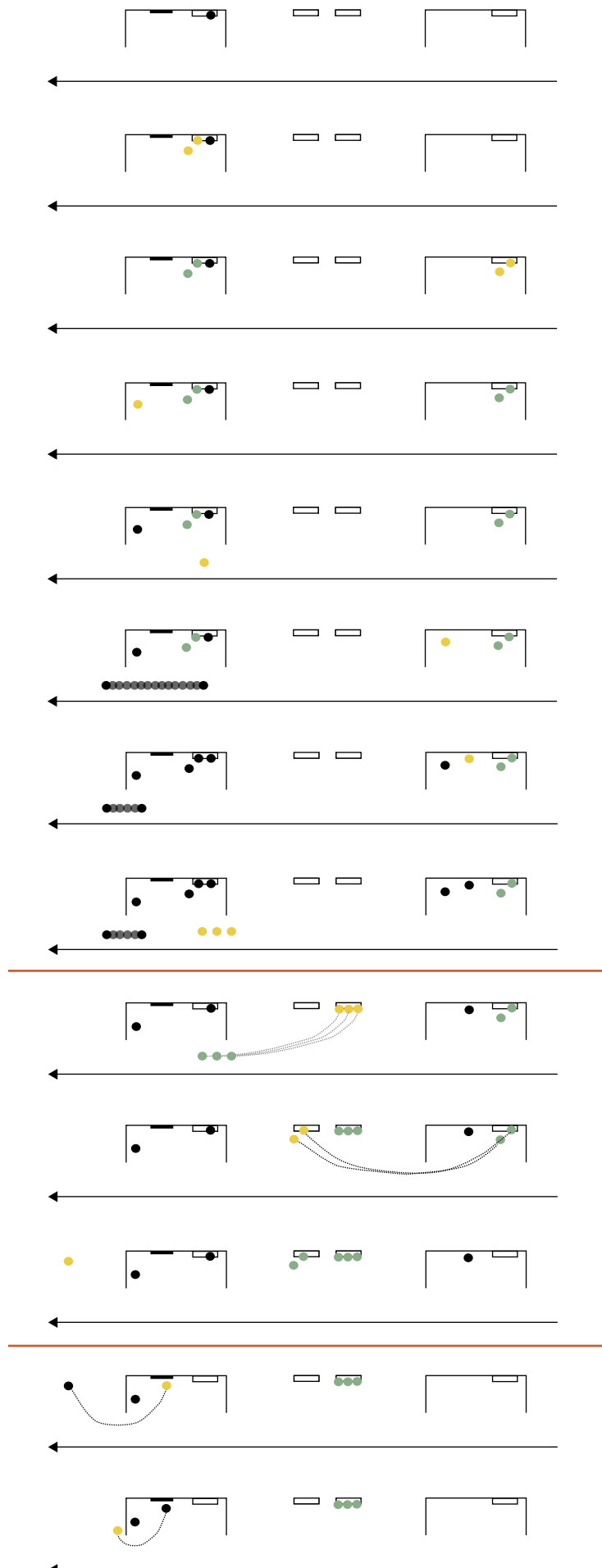


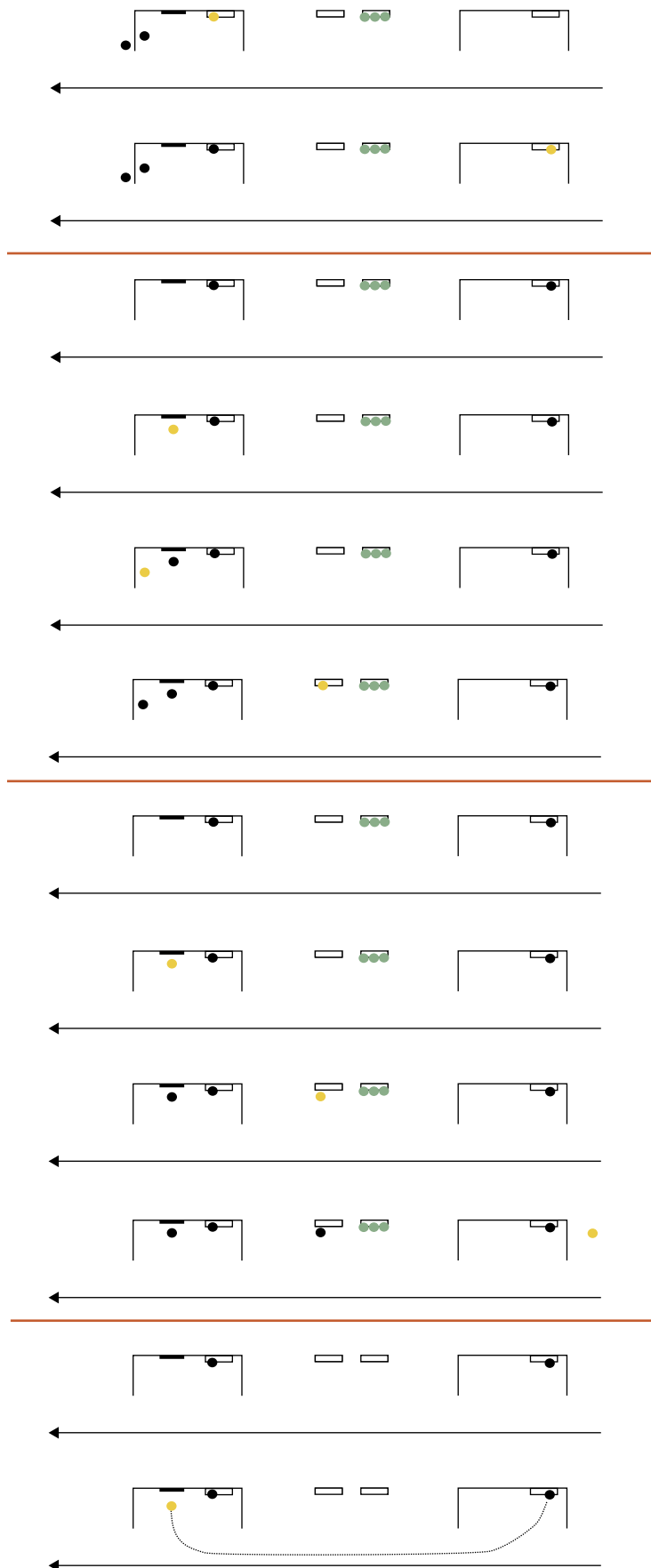
8 person

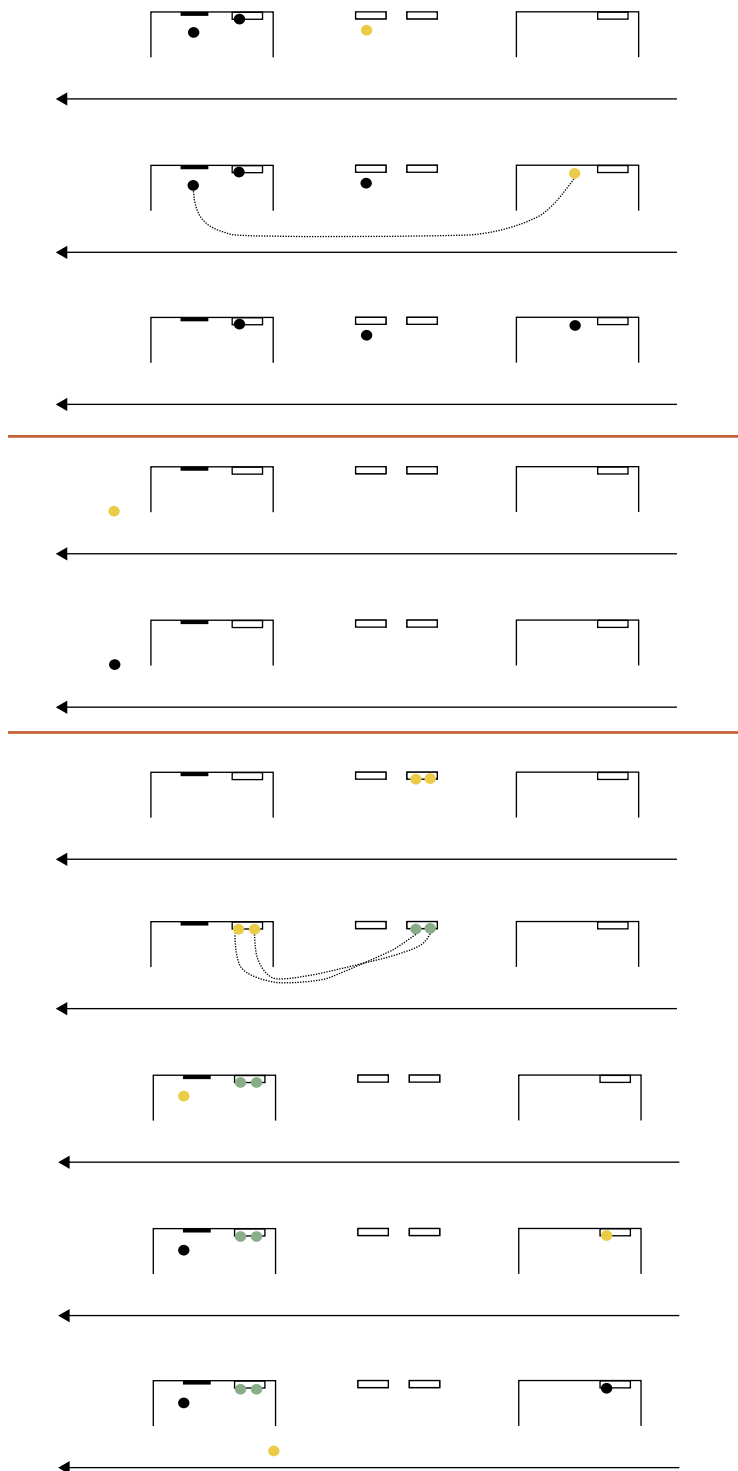


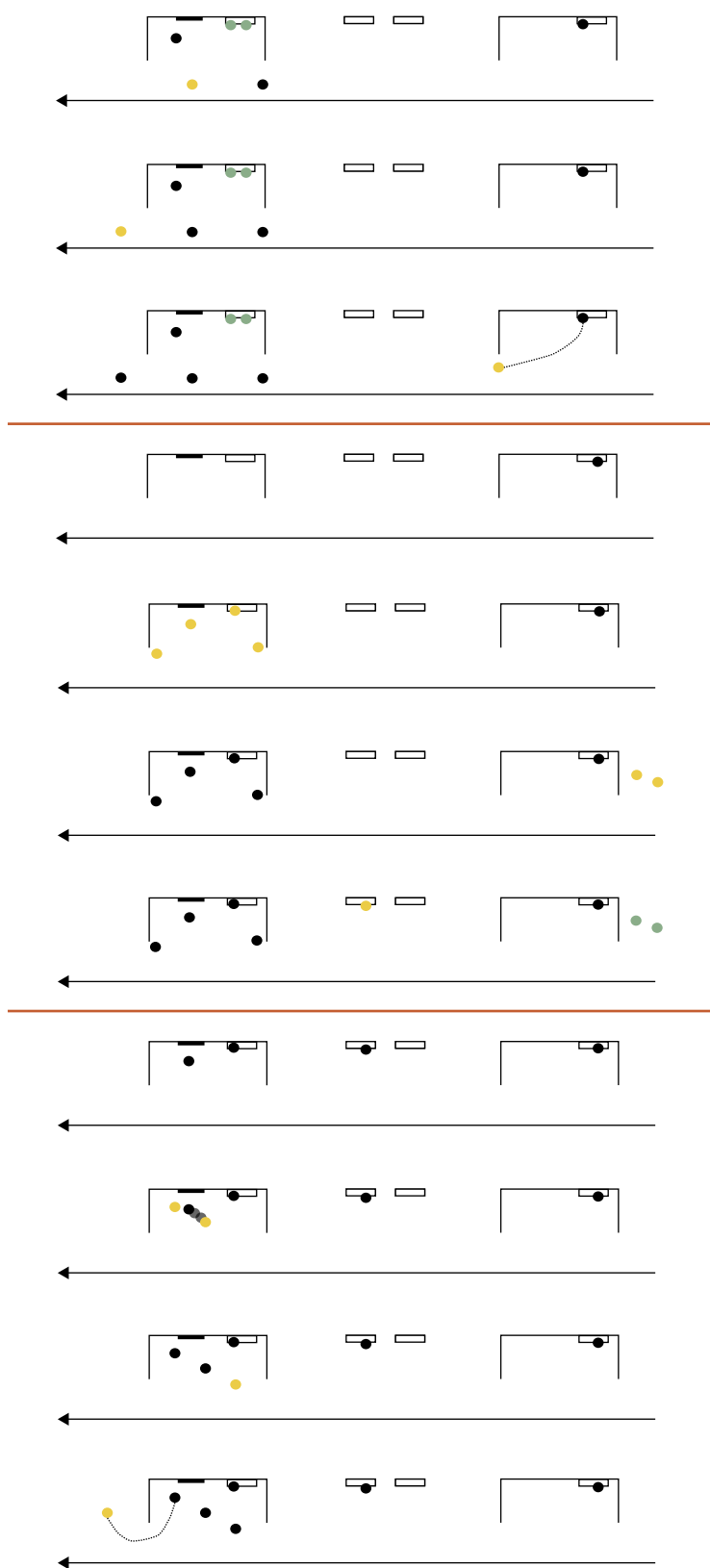
Physical evidence

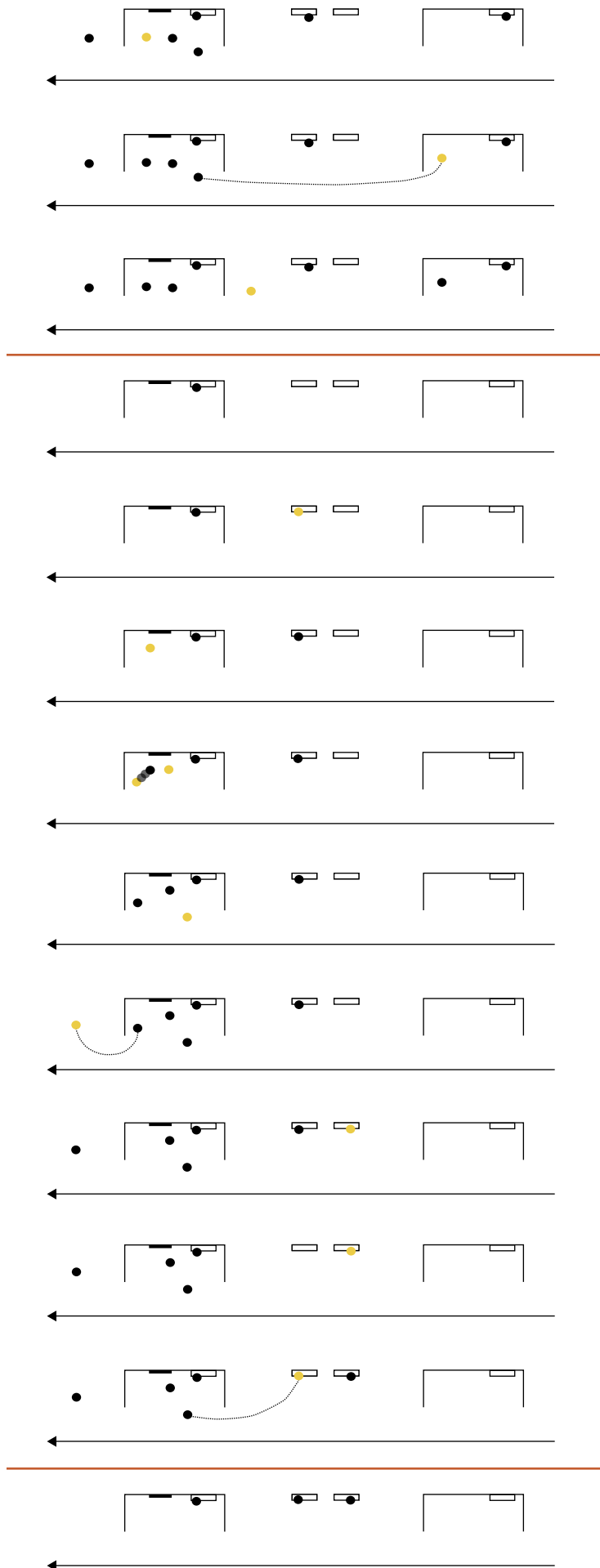
-Study of how people
move at the bus- & tram
stop Vasaplatsen (läge D)







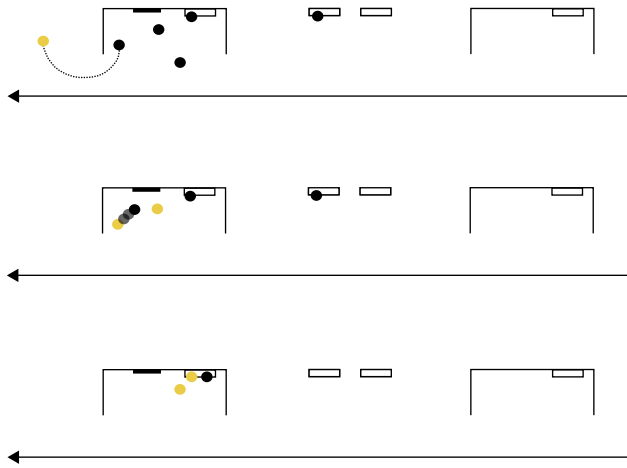




Conclusions
Physical evidence

Examples from evidence

Territorialisation

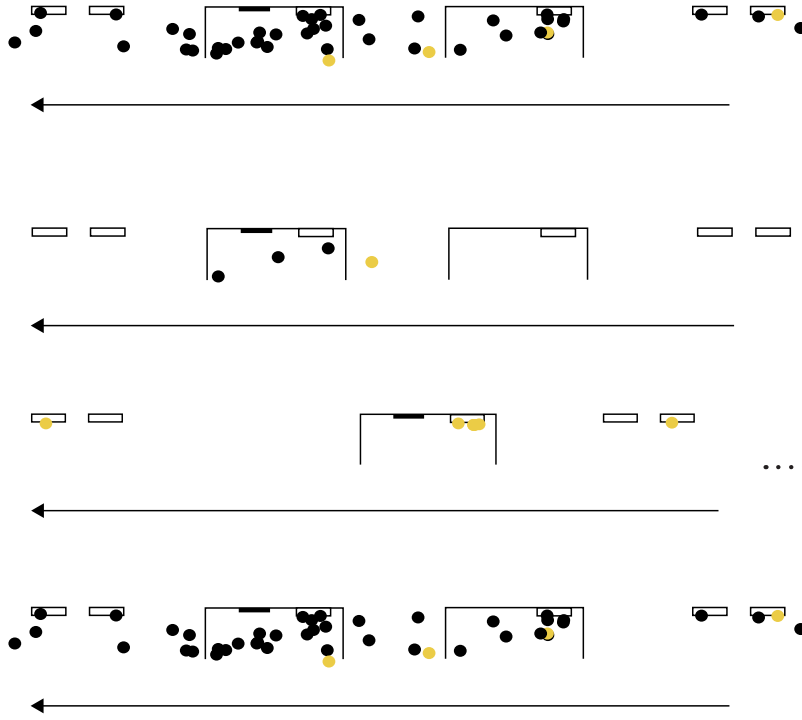


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.....

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Preferred spots/zones



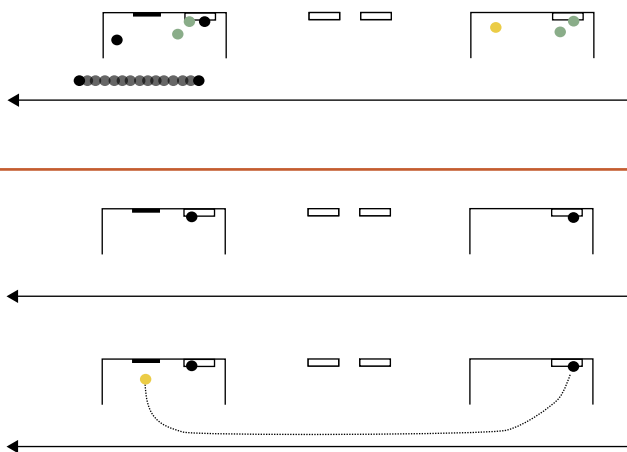
.....

.....

.....

.....

Movement



.....

.....

Phenomena

..... -Unless raining the shelter is considered full at 3 people.

..... -If someone needs to move into your sphere
(ex to check timetable) you step away.

..... -People in groups get braver, can go closer to people they don't know
than they probably would have if they were alone.

..... -There are parts of the site that are more popular than other, the
timetable, where the bus front is when it stops and the benches are
more popular.

..... -The shelter is preferred up to 3 persons then full (see
territorialisation)

..... -Benches are popular if free.

..... -We prefer zones of low movement (not in any ones way) like along
the shelter wall or the railing.

Why people move

..... -Movement as a kind of distress, pacing around,

..... -Movement is mostly between trajectories, checking the timetable,
finding shelter etc.
most keep in their established territory yet a movement is
occasionally triggered by external changes like a bus passes that is not
yours, this induces insertenity which result in movement (checking
timtable).

Conclusions

Territoriality and personal sphere:

- Normally people don't sit down on same bench.
- Unless raining the shelter is considered full at 3 people.
- If someone needs to move into your sphere (ex to check timetable) you step away.
- People in groups get braver, can go closer to people they don't know than they probably would have if they were alone.

The best spots:

- The part of the site where the bus front is when it stops is more popular.
- Benches are popular if free.
- The shelter is preferred up to 3 persons then personal sphere.
- If possible people like to put down their bag.
- We prefer zones of low movement (not in any ones way) like along the shelter wall or the railing.

Access to information:

- There is a high concentration of both movement and people where the info sign is situated.

Why move?

Mainly people tend to stand still when at a bus- tram stop, when we have established a territory we seem reluctant to give it up, we don't want to leave our comfort zone, yet when we move it seems to be because of some of the following reasons.

Territoriality:

- To establish a territory
- A better position; like a possibility to sit down or closer to where the bus's or tram's front will be (yet not always considered a necessary movement).
- Someone is imposing on your personal sphere (coming to close) so you move away.
- The shelter is too crowded (normally when the forth person enters the shelter someone else move out).

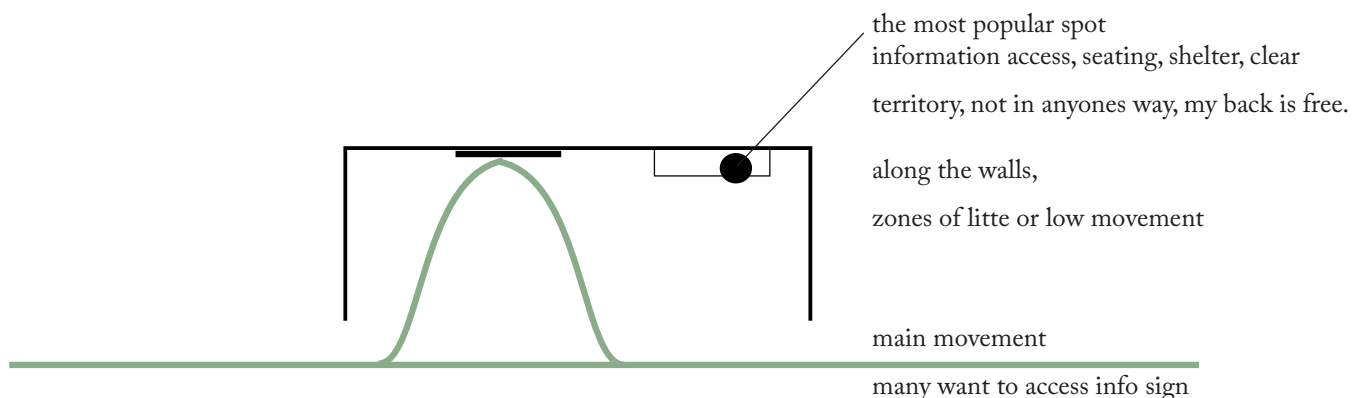
Access to information:

- To check timetable, this is commonly triggered by something, like the wrong bus passing by (when is my bus coming exactly?).

Action:

- The pacing around as a stress relief, to distress.

The best spot



the phenomena in relation to the modes

trajectories

- possibility to sit
- possibility to lean
- timetable
- shelter
- where the busfront is
- sensitivity to external changes
- need to attach
- territoriality on something
- braver i groups
- my back is free
- personal sphere
- movement stepping away
- desire for the perfect spot
- reevaluation chosen spot
- movement pacing around

settled	pre-settled	unsettled	non-settled
5	2	4	4
4	5	2	1
0	4	5	0
5	3	4	5
0	4	5	0
0	4	5	0
4	2	3	5
4	2	5	5
3	2	4	5
5	3	4	5
3	5	4	2
5	2	3	5
1	4	5	2
2	4	5	4

CONCLUSIONS:

-The DENSITY (personal sphere, territorilisation) is of great importance.

-The ITEMS, benches, possibility to lean, shelter etc, is shifting in need dependent on what mode you are in.

-The TRAJECTORIES, info signs, possibility for sun, where you get on off the bus etc, is attractors influencing peoples preferable space and how we move.

-The MOVEMENT at the site is mainly between TRAJECTORIES and dependent on what the density allows for.

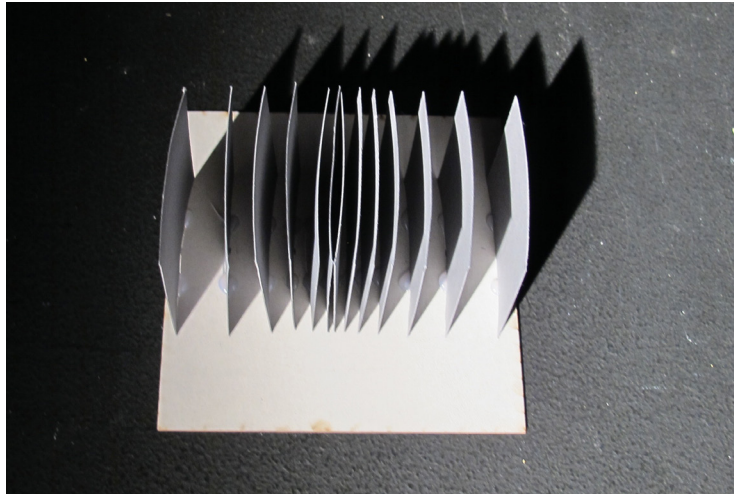
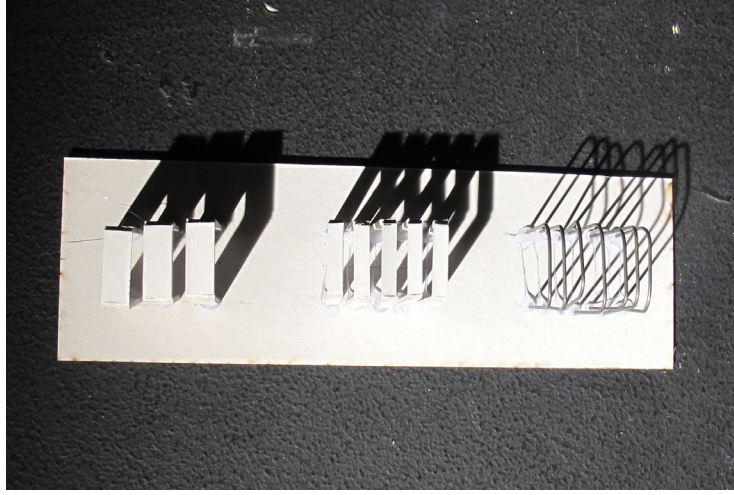
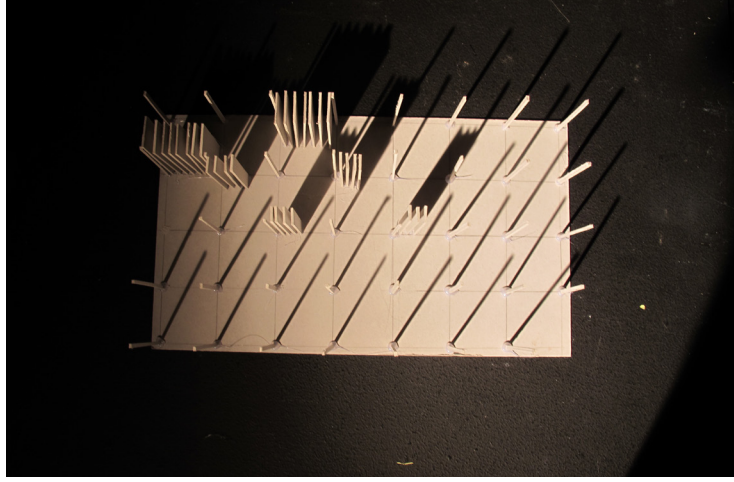
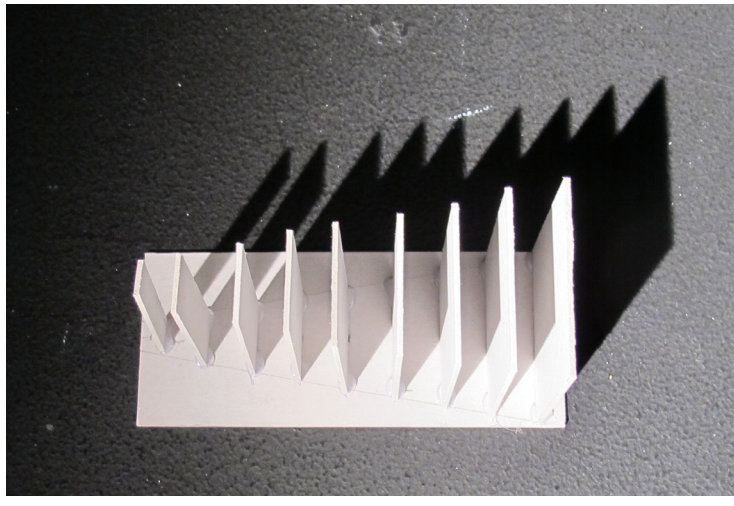
■ Affecting what is needed interms of trajectories and items .

■ Affecting suitable positioning of mode in relation to other modes and site.

■ Affecting higher/lower density, allowing for movement

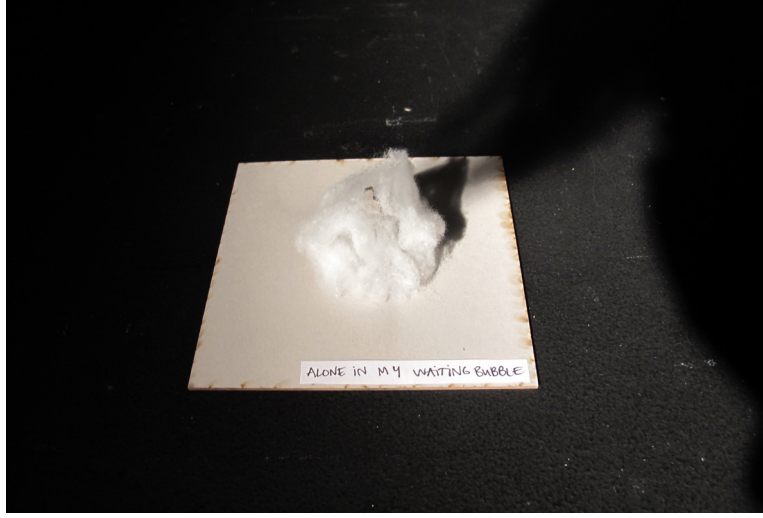
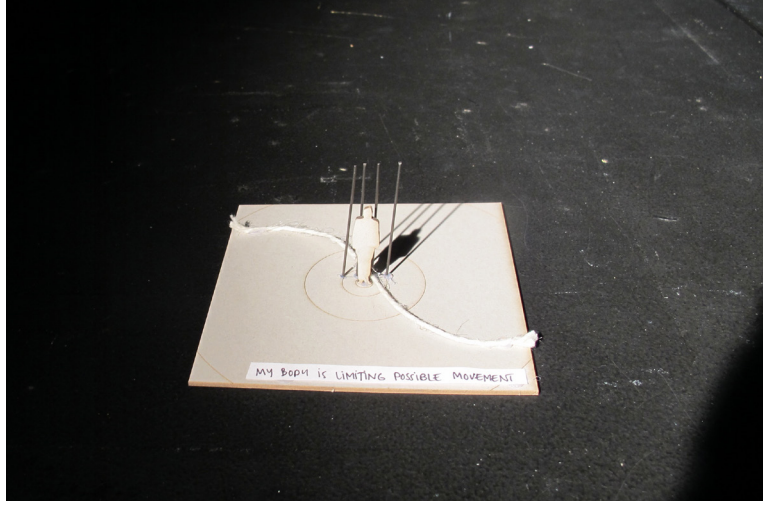
The model research had three main objectives in terms of investigation, personal sphere/density, what constitutes a comfortable zone and visibility. These themes have been investigated through model research both individually but also together. Looking on personal sphere the models mainly focuses on considering how dense we can stand I relation to others. Territoriality focuses on what is needed for us to feel comfortable in our zone and finally visibility focuses on the need to see and be seen in public places.

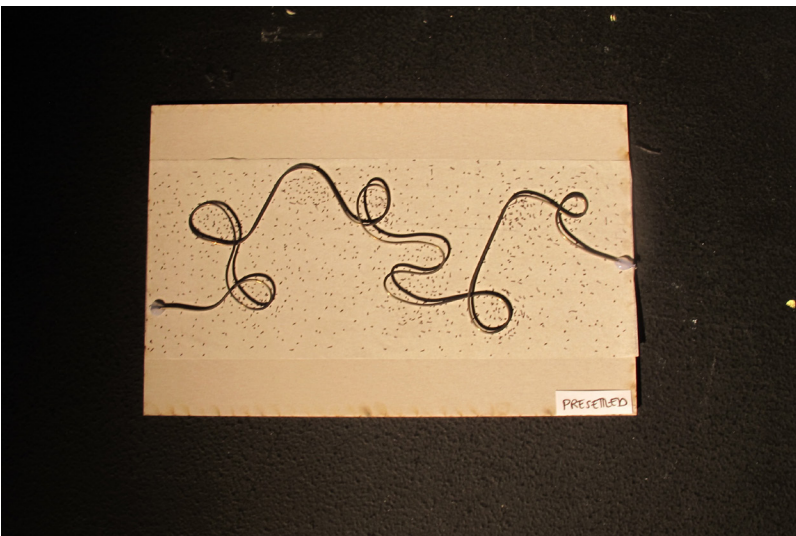
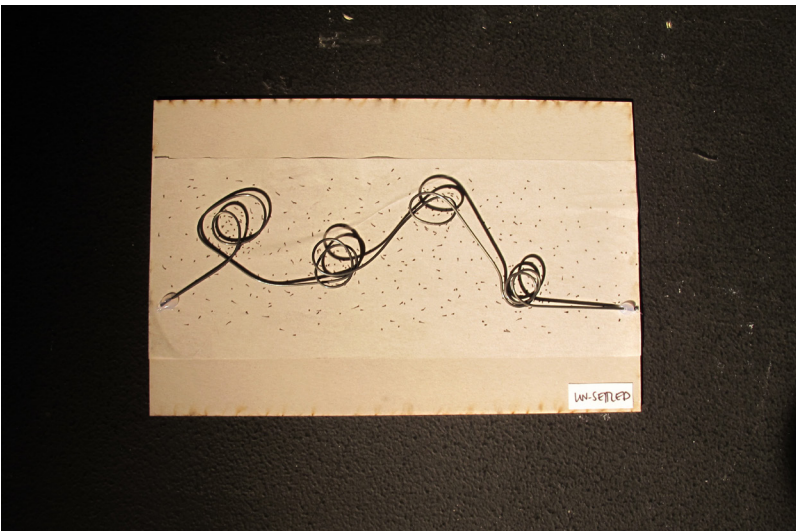
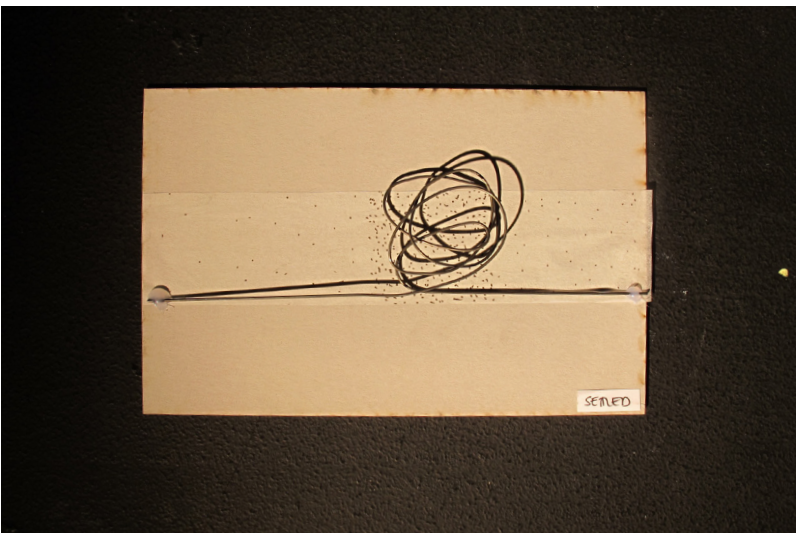
I have had a rather intuitively way of working with the models partly letting my hands lead the way rather than my thoughts, then drawing conclusions from what I perceive rather than the other way around. I feel that this way of working often lead me to consider things that I would not otherwise consider and whereas the opposite way of working with models, where I to specifically try to test an idea rather becomes a way to prove a point and not as interesting. This means that some models within the research has become very important whereas others are quite uninteresting nevertheless an important part of my work.



investigating density

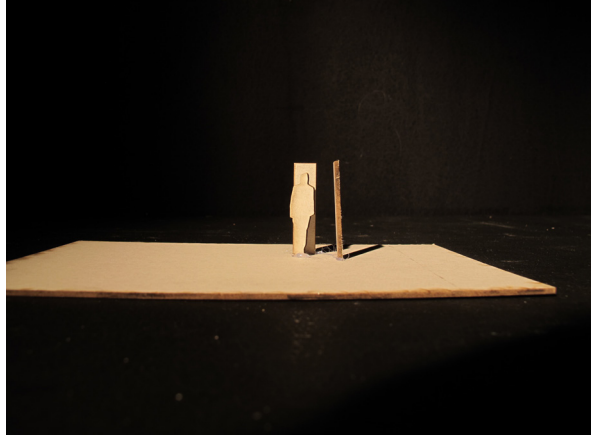
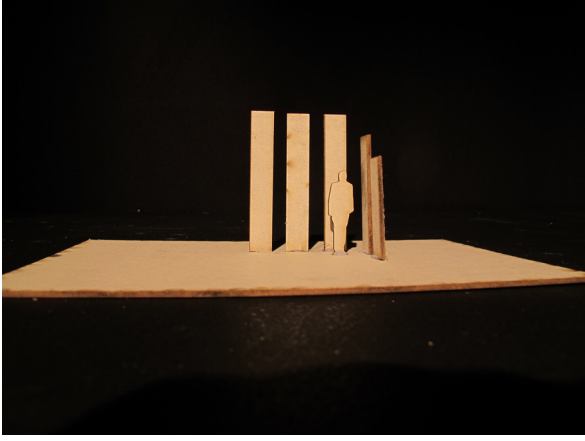
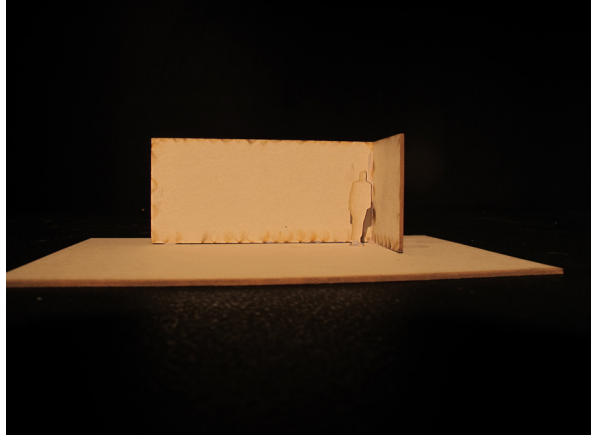
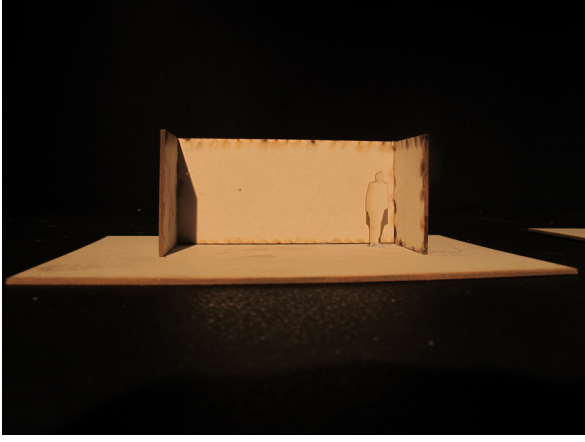
investigating personal sphere

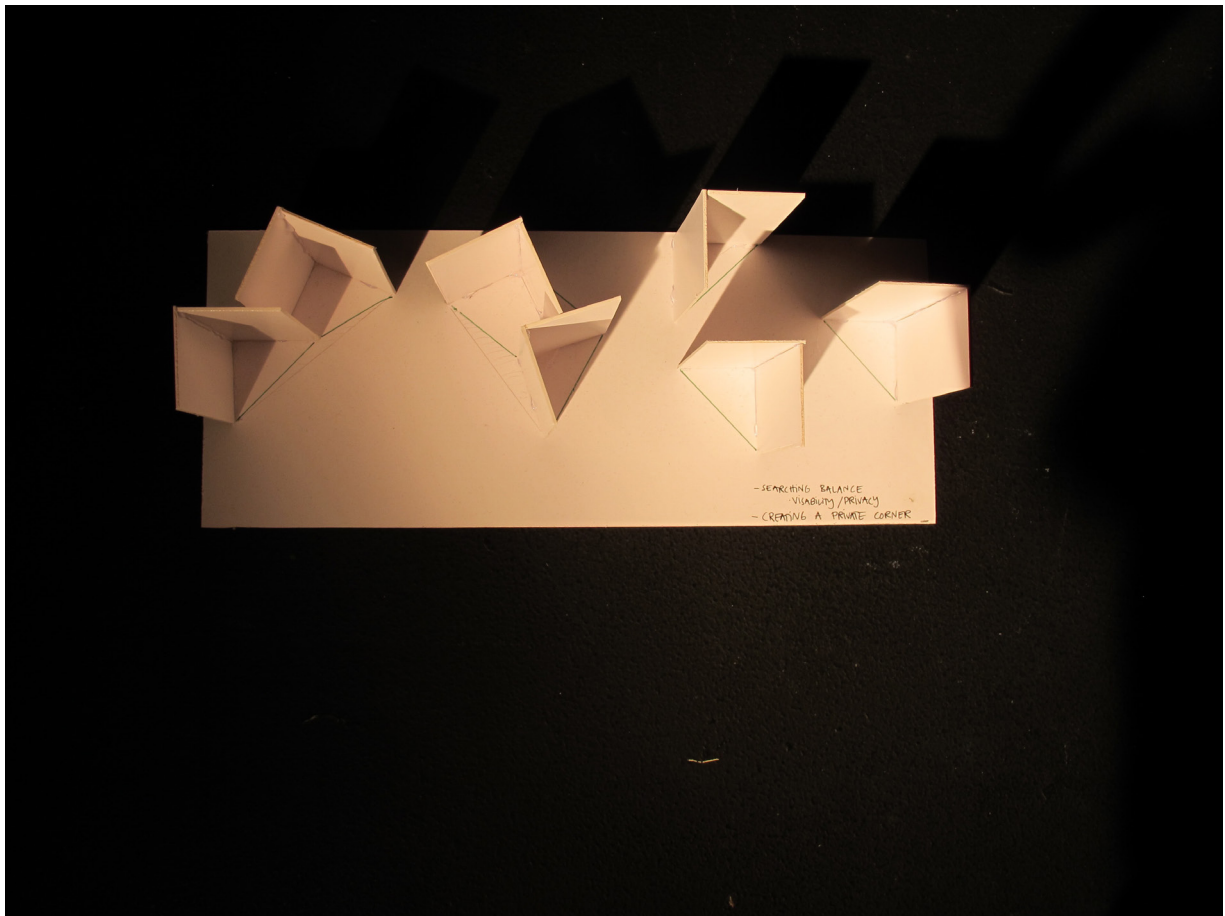




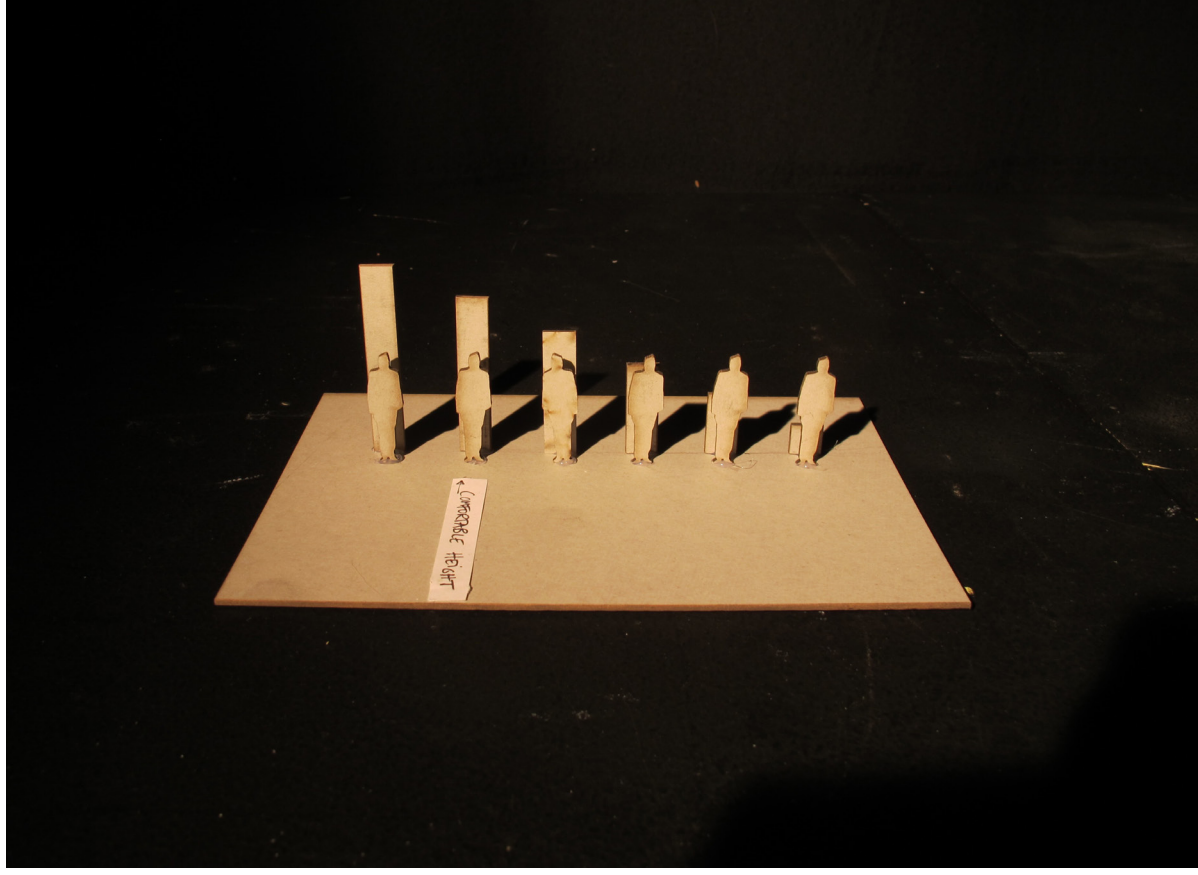
investigating density

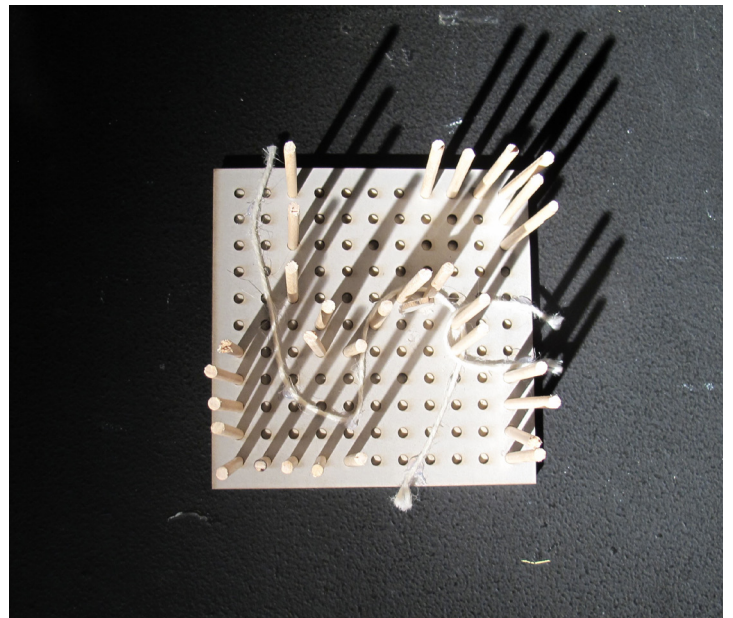
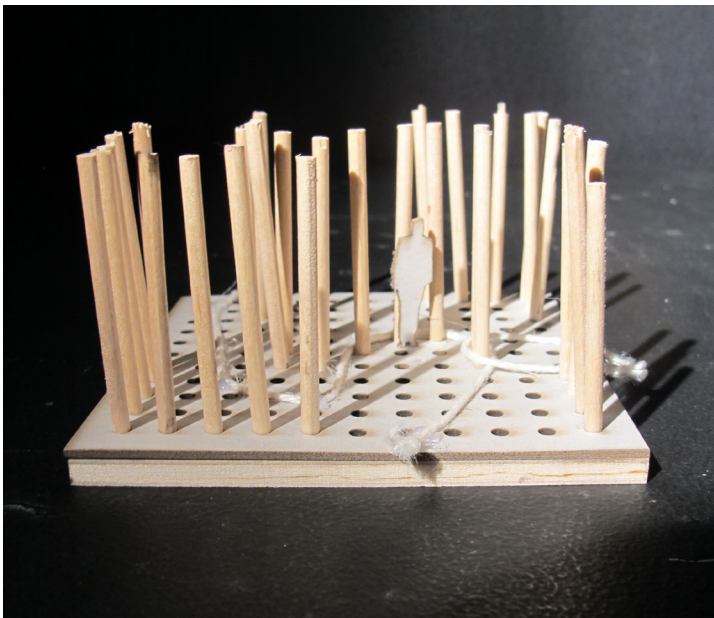
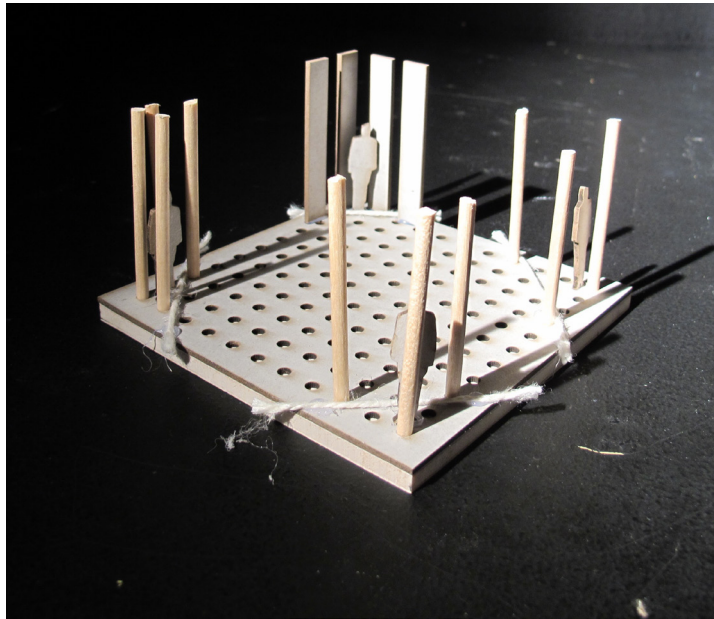
investigating zone

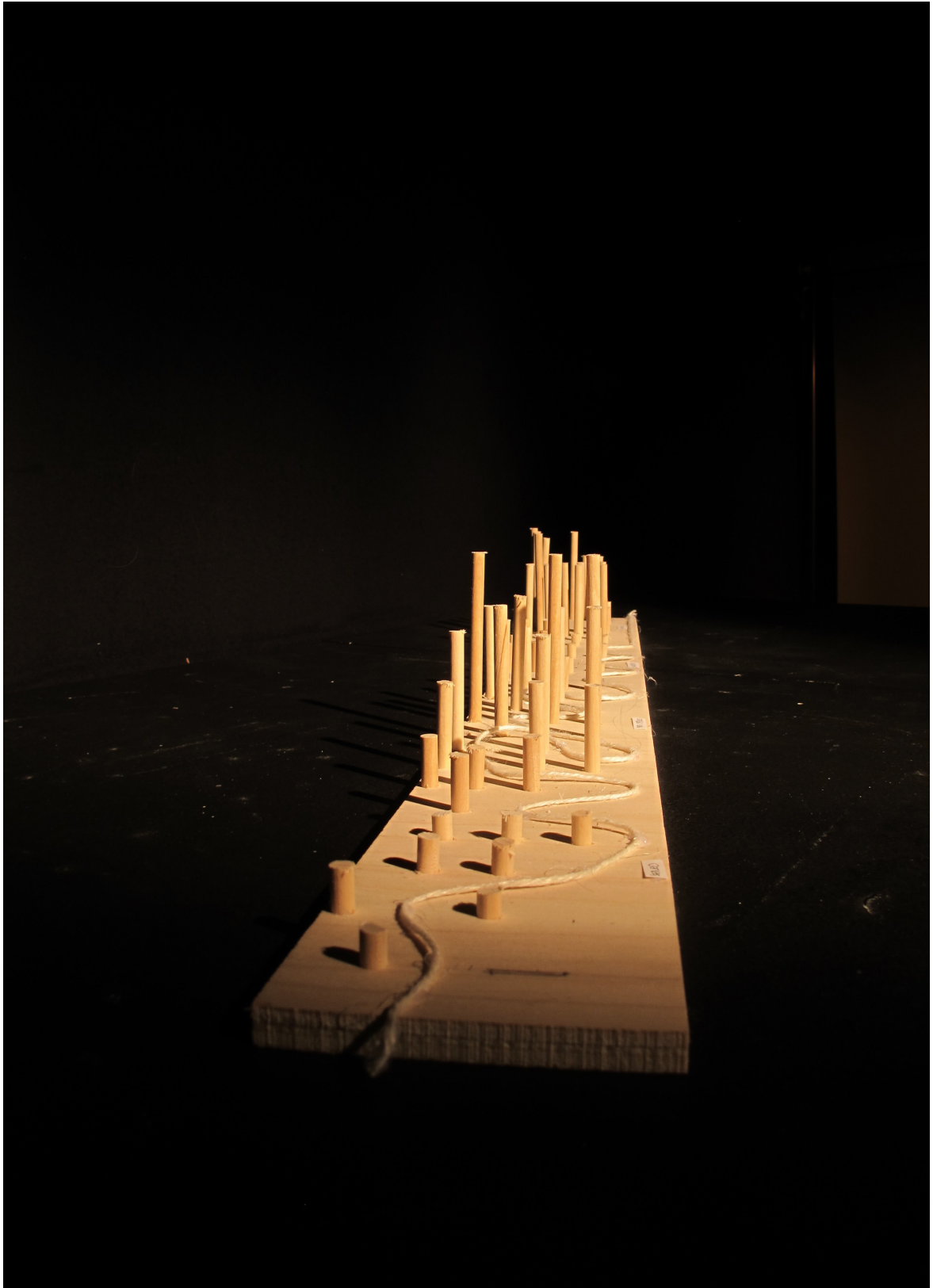


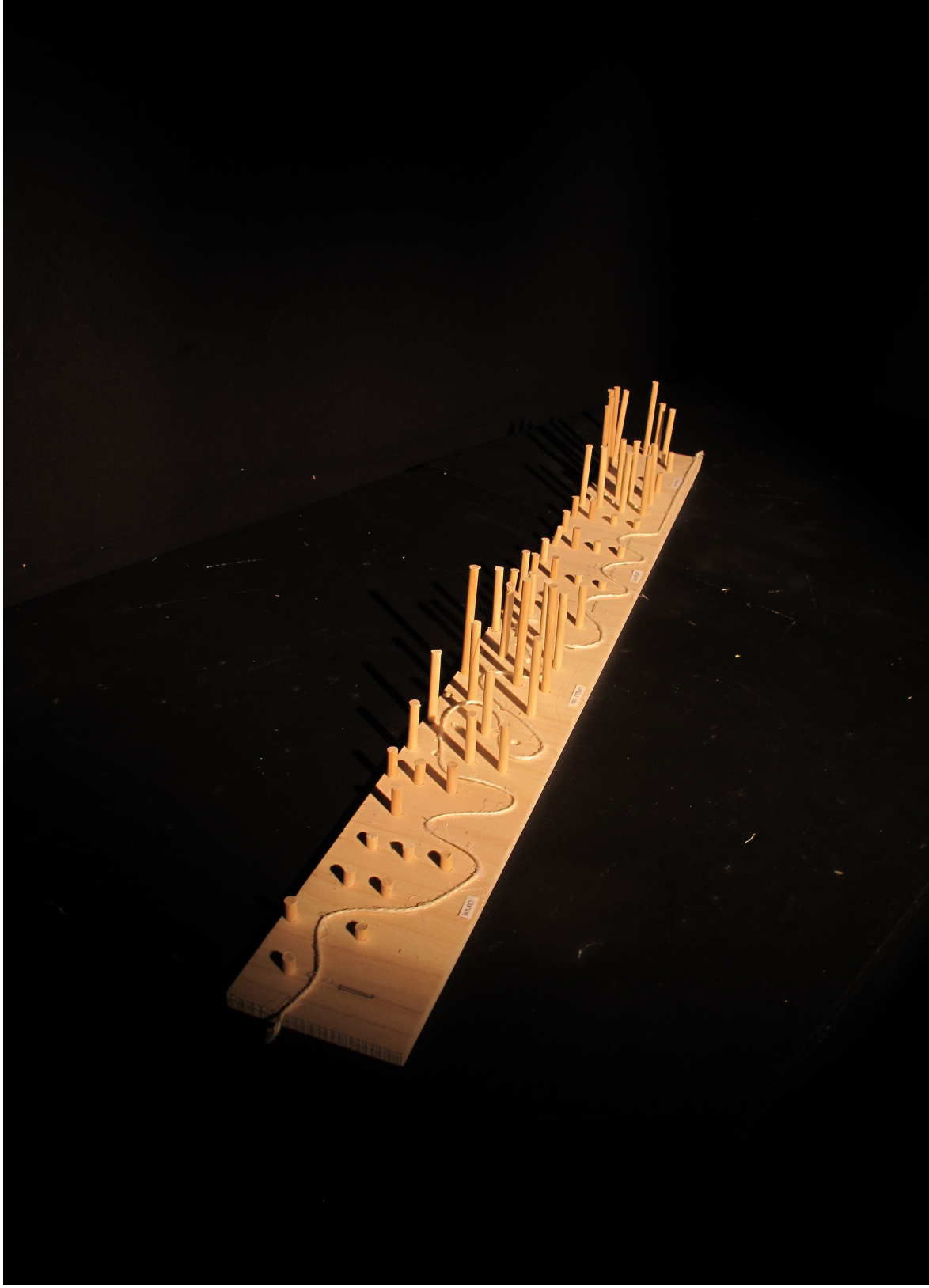


investigating visibility/flows/density/zones



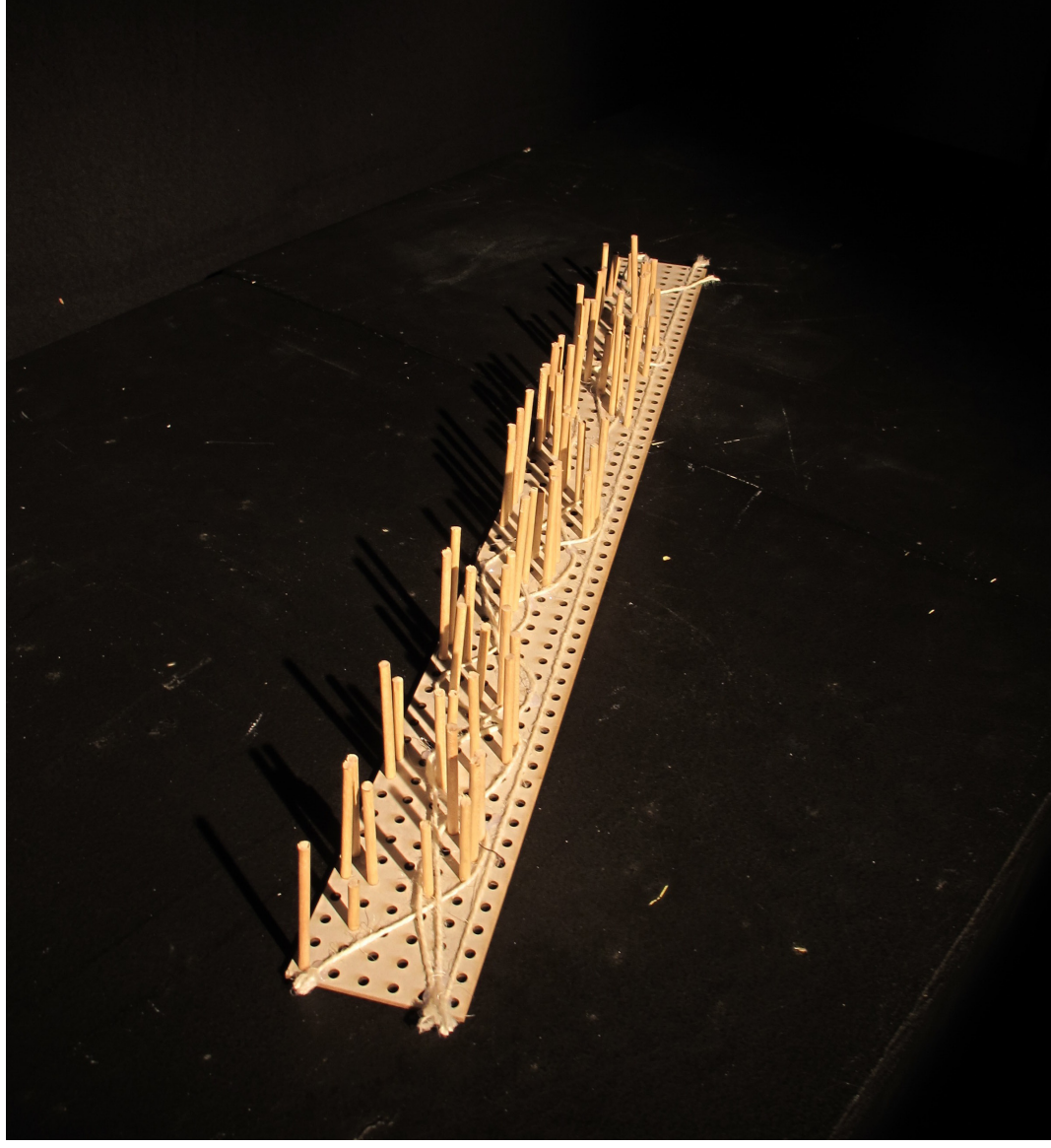






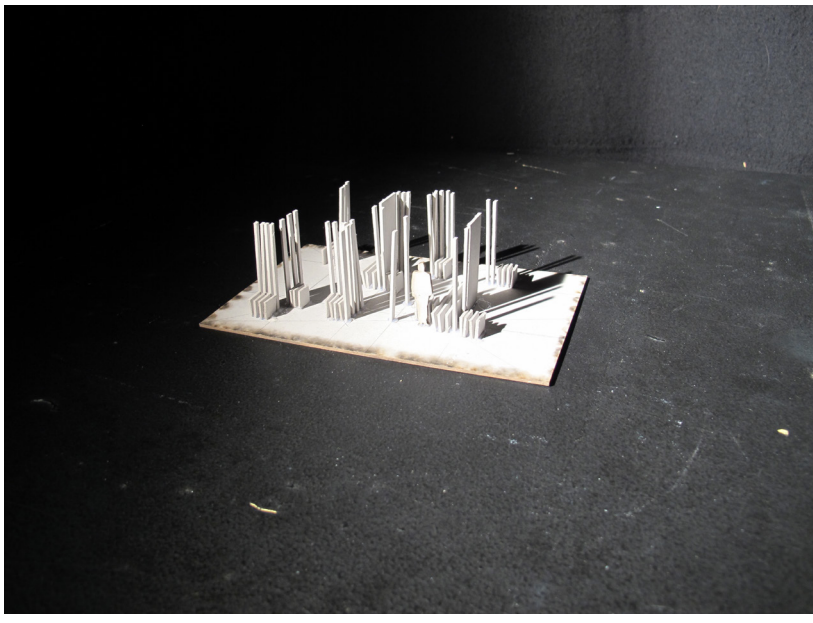
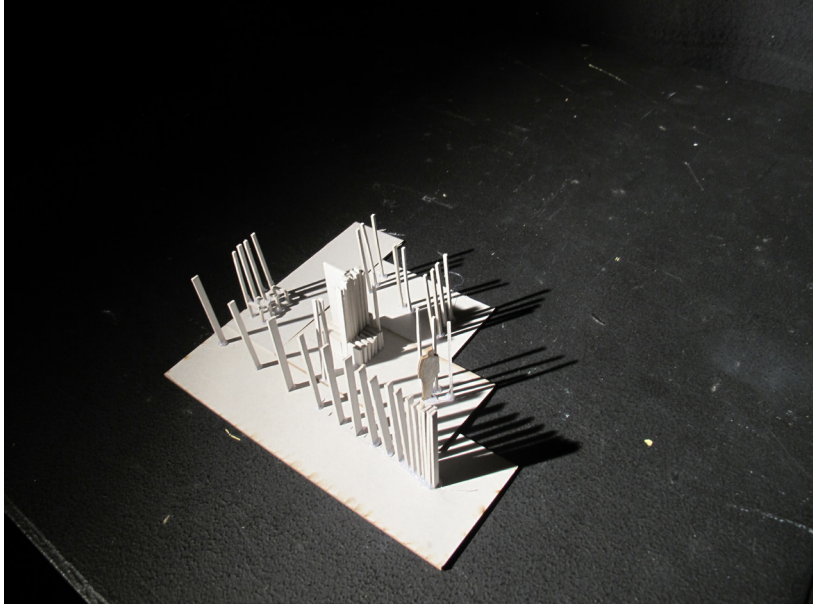
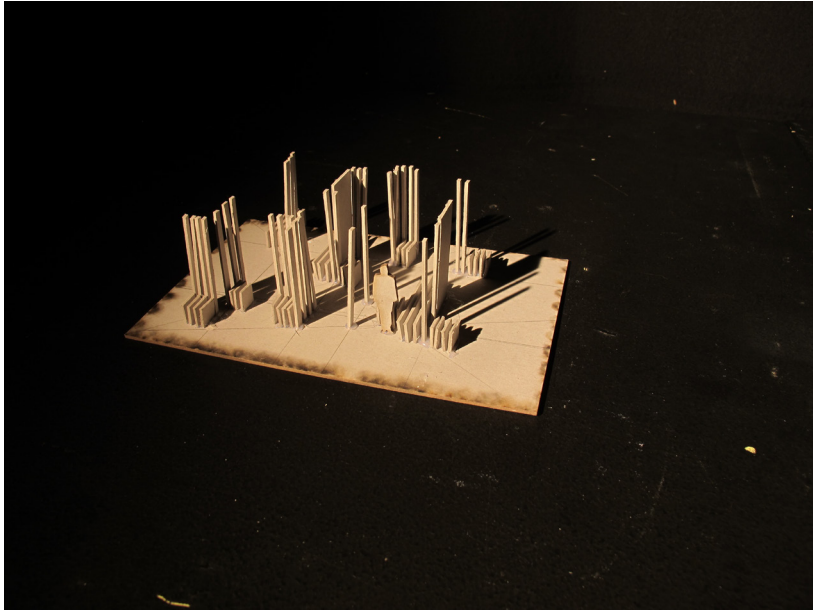
investigating visibility/flows

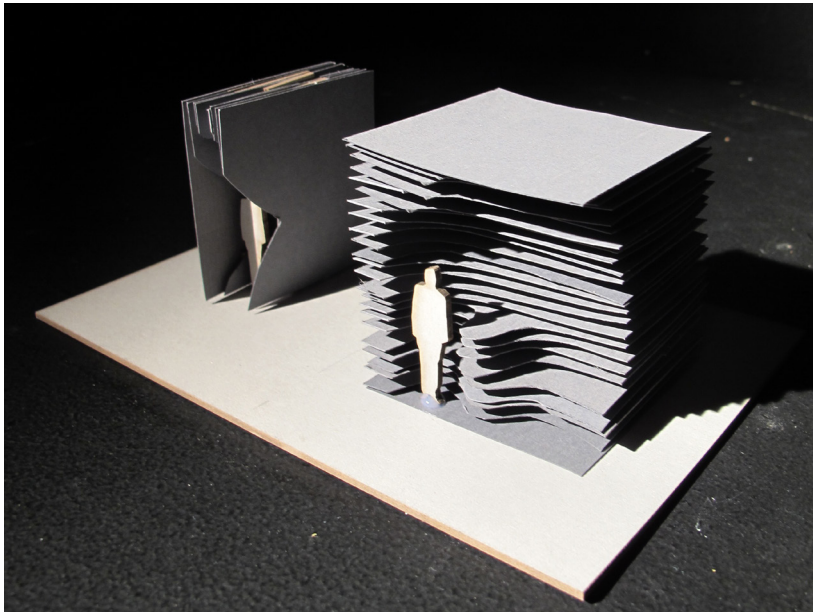
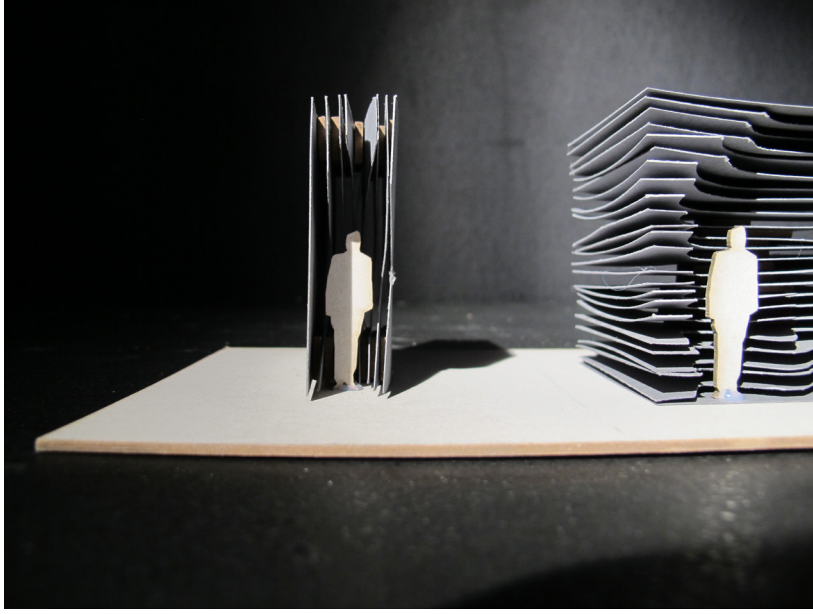
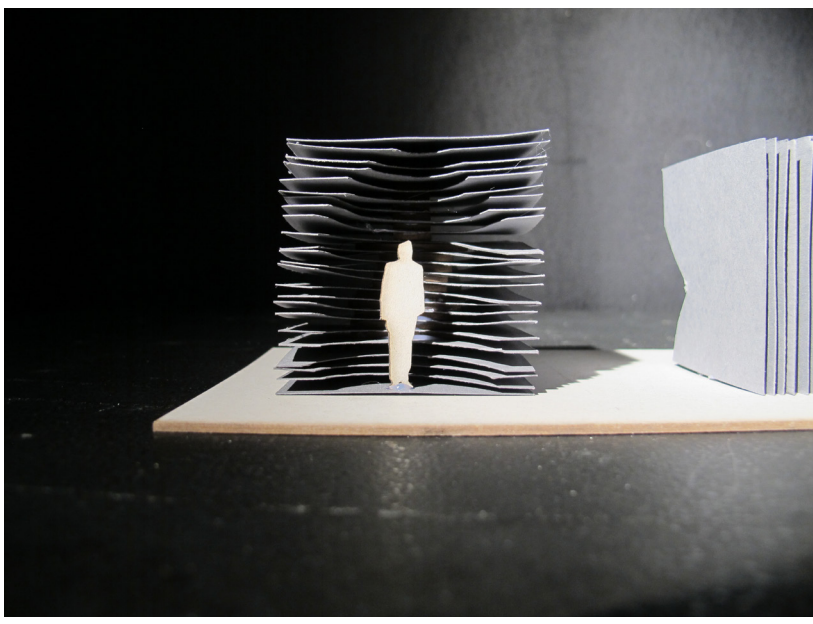
investigating visibility/flows/density/zones





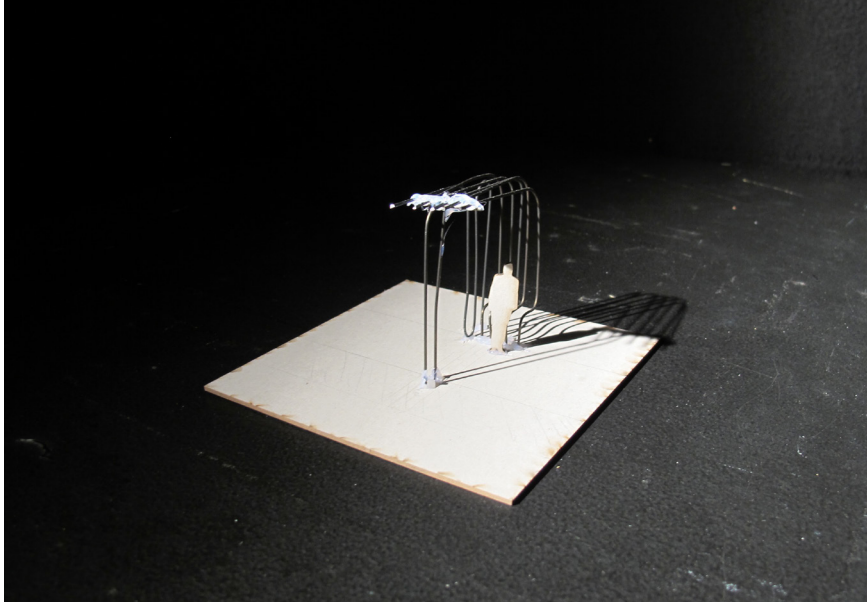
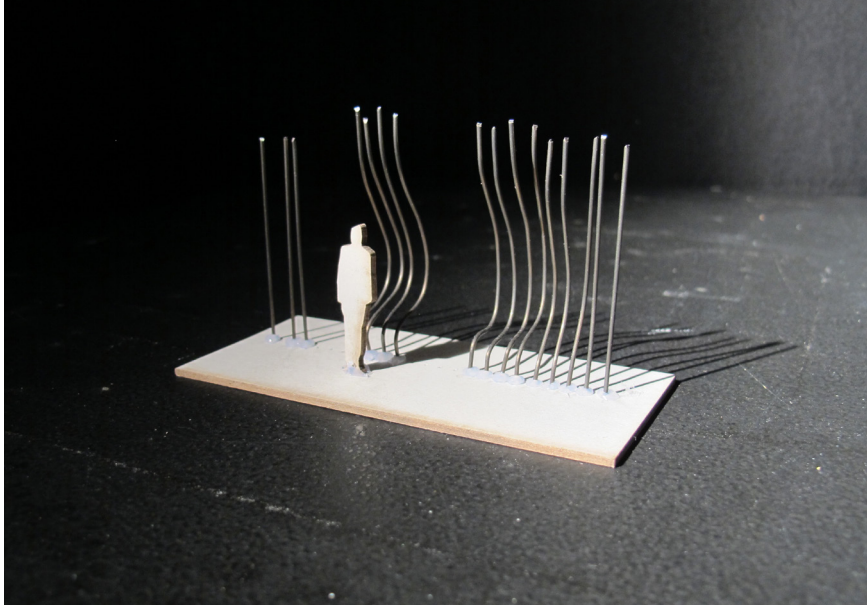
investigating visibility/density/zones





investigating visibility

investigating visibility



REFLECTION

The conclusions I have drawn from the model research is that a fruitful way to work in public space considering the three aspects investigated (personal sphere, comfortable zones and visibility) is to use density as a tool to work with all three aspects. To let different zones have different densities in terms of both materiality but also how dense we stand in relation to others. The model research has also provided me with a perception of how much or how little is needed to create a possibility for territorialisation and how we can allow for more possibilities in terms of how we let movement flow in relation to the static.

Choosing Site

Ruling out the major interchange stops (the primary nodes), I looked at secondary nodes (which all have 6 or more tram- bus lines passing) in order to find a stop with a wide spread in different waiting times. The more lines the more difference in waiting times.

Checking timetables 5 stops had waiting times up to 30 minutes.

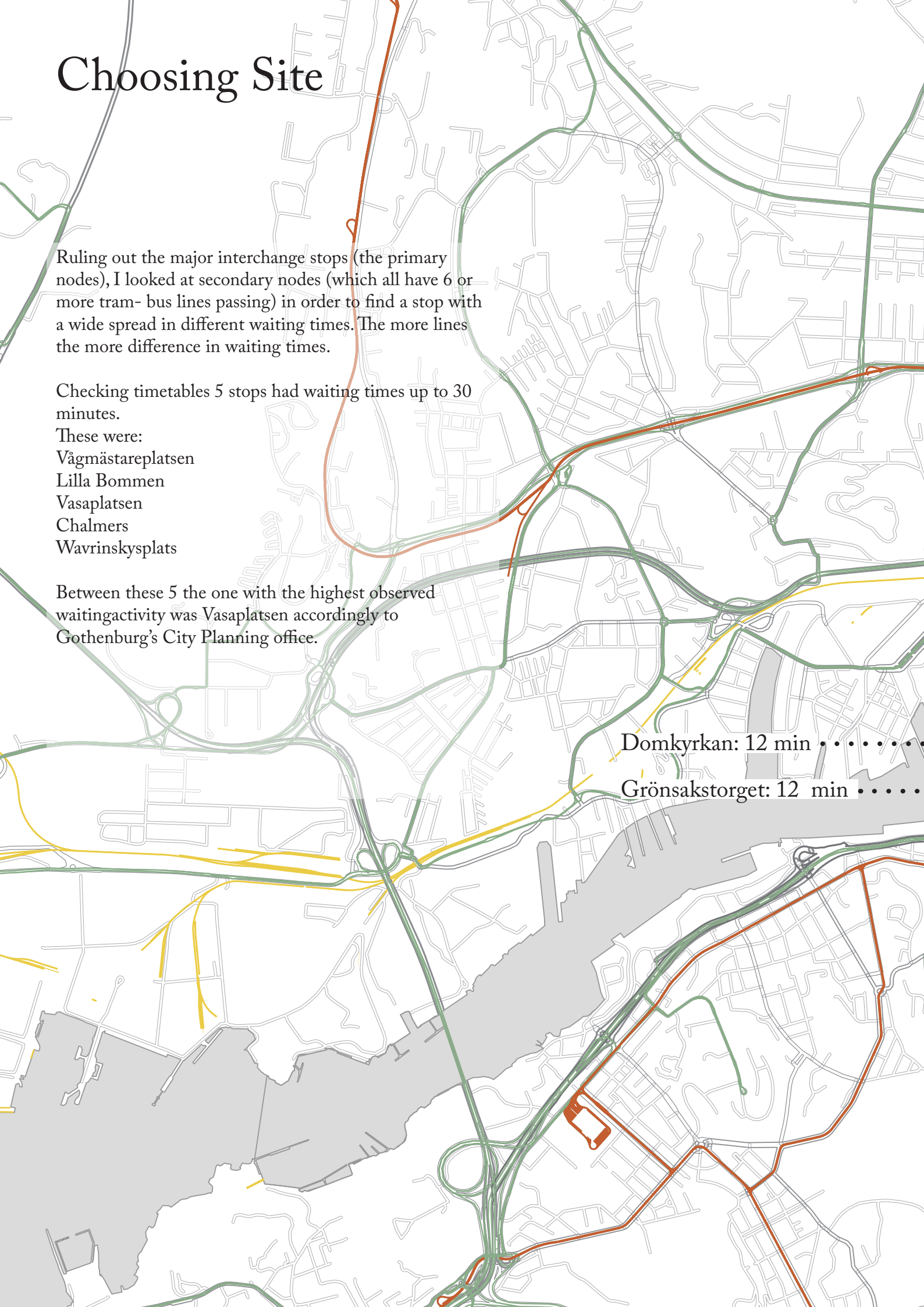
These were:

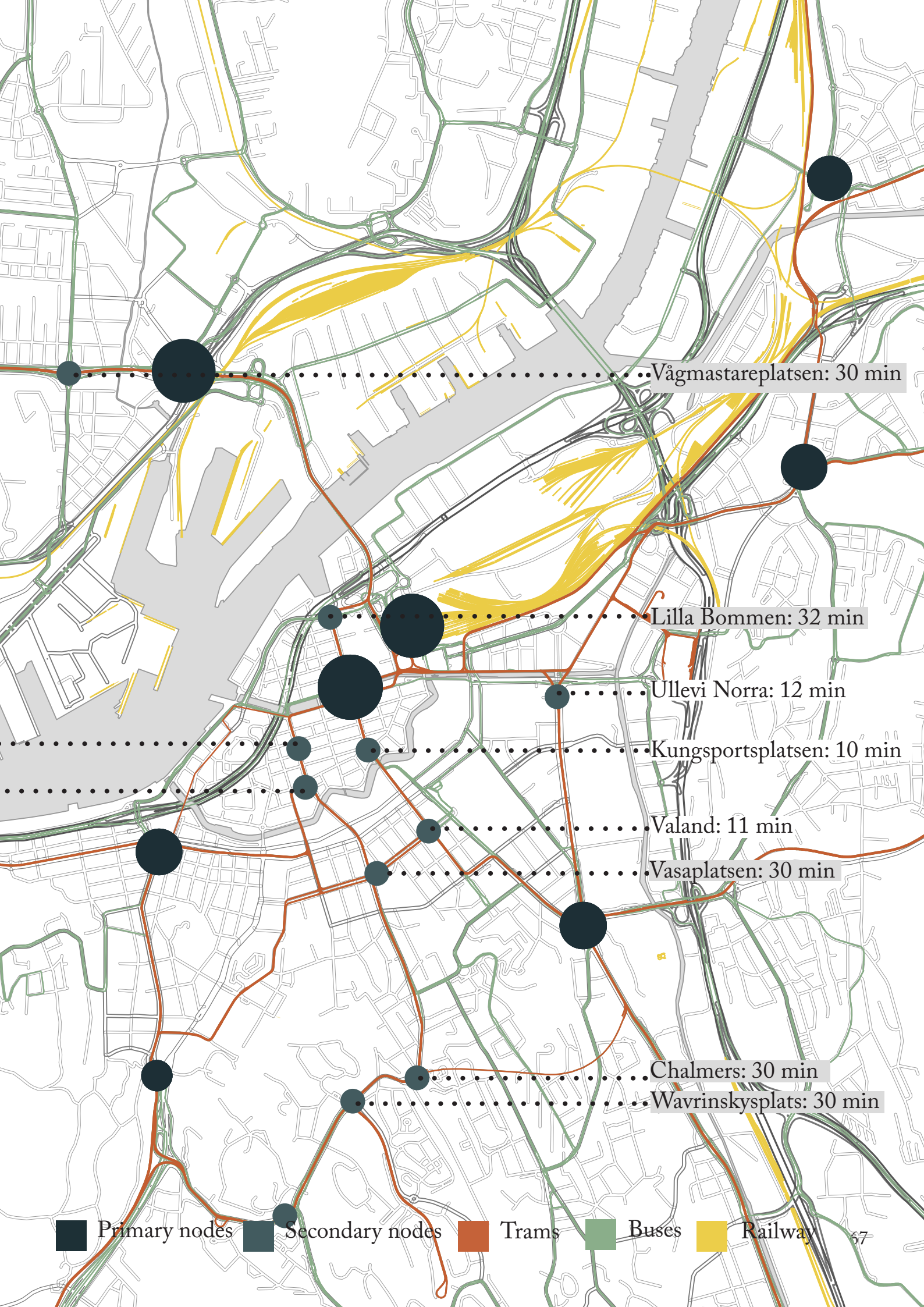
Vägmästareplatsen
Lilla Bommen
Vasaplatsen
Chalmers
Wavrinskysplats

Between these 5 the one with the highest observed waiting activity was Vasaplatsen according to Gothenburg's City Planning office.

Domkyrkan: 12 min

Grönsakstorget: 12 min





Läge D:
Buses: 16, 19, 158, 753
Trams: 2
Waiting time: 0-30 min

This stop is trafficked by both buses and trams and the stop has two rather big shelters stealing some space from the green area. It has the possibility to expand. There are not many people passing through the site.

Läge C:
Buses: 16, 19, 158
Trams: 2
Waiting time: 0-30 min

This stop is situated at a rather unusually long traffic island and it is trafficked by both buses and trams. The shelters are narrow and there is no space for expansion in any direction. There is no movement through the stop due to its isolation as traffic island.

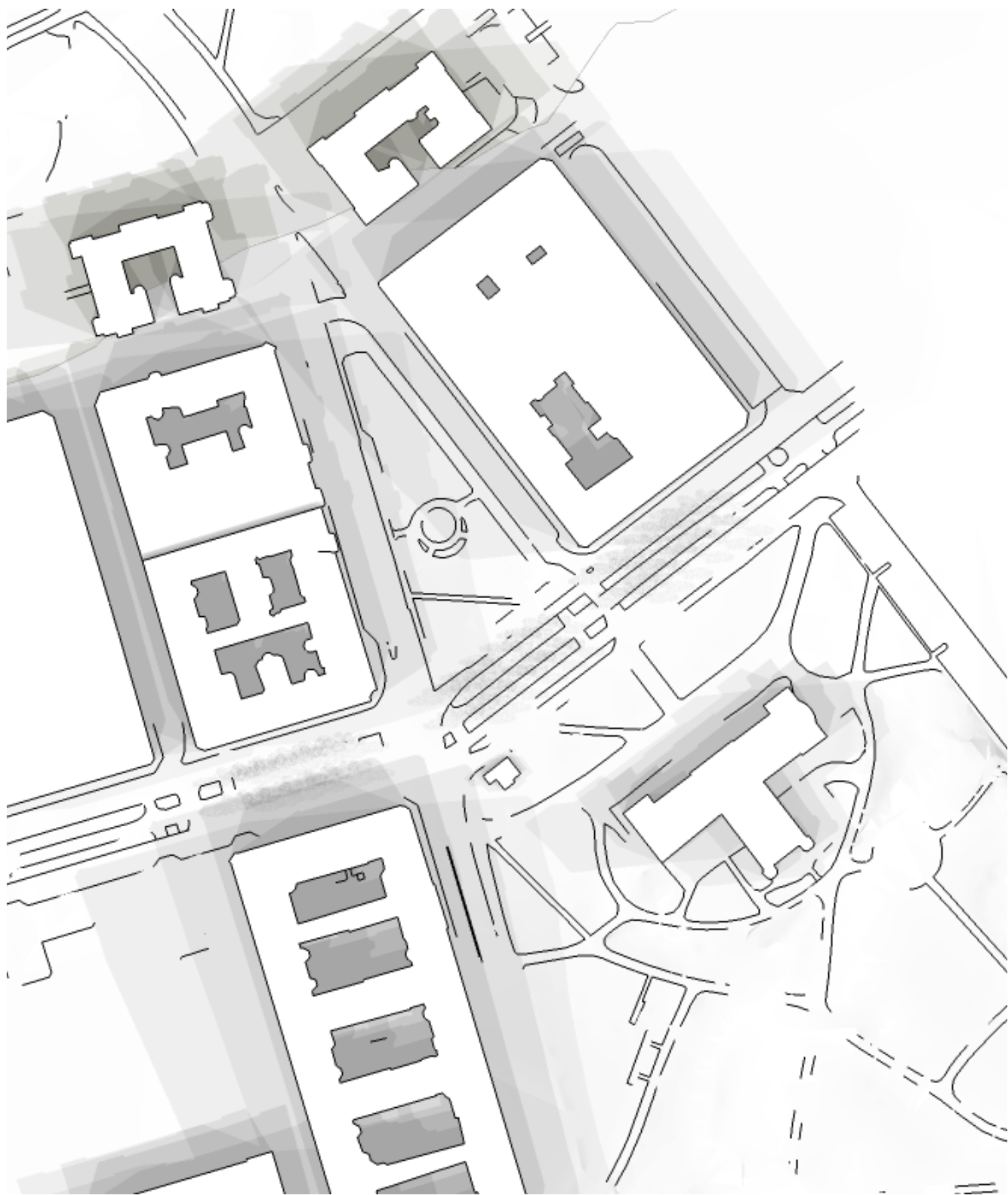
Läge B:
Buses: -
Trams: 3, 7, 10
Waiting time: 0-12 min

From here you can only catch trams and the stop is part of the walkway with Vasaplatsens small green area just behind it. There is a possibility for the stop to expand into this green area and there is a need to provide zones of lower movement while waiting.

Läge A:
Buses: 753
Trams: 3, 7, 10
Waiting time: 0-30 min

From here you can catch both trams and buses and the stop is situated on a traffic island, which means it has no possibility to expand. The stop is parallel to the main flow along Vasagatan yet not many people are walking through the spot due to its location in between traffic. Possibility to create a calm waiting zone.

Vasaplatsen is situated in the historic part of Vasastaden, which was a part of Gothenburg that was built mainly during the end of the 19th century. The inspiration for the city plan was taken from Paris and Vienna with square shaped blocks and stone buildings around 5 stories high. Vasaplatsen got its name 1882 and works like a green breathing spot in an otherwise busy streetscape. The site is underused due to lack of programming, there is a small fountain and some trees but mainly there is just grass. The site functions as an interchange stop and there are traditional bus shelters placed around the site at the different waiting zones. I choose läge D due to the high differentiation in waiting times at this zone but also with regards to the site. Here I have a possibility to activate the underused green space.



Shadowstudy Vasaplatsen

Looking to what I have found in both my positional study but also in my model research there are three main themes that have become main objectives in the end design: trajectories, density and positioning of mode. These three set the frames for the end product.

Trajectories

Today;

Mainly two trajectories are affecting the studied busstops, it is where the buss or tram is positioned when still and where the timetables are. These two creating a main flow along the busside and a lot of movement inside the shelter with the timetable. It seems like no regard is taken to the specifics of the site.

By working with more parameters like attractors at the site and by positioning trajectories differently the stop gets more diversified flows and becomes a more natural part of the city.

Main parameters to work with:

Possibility for sun

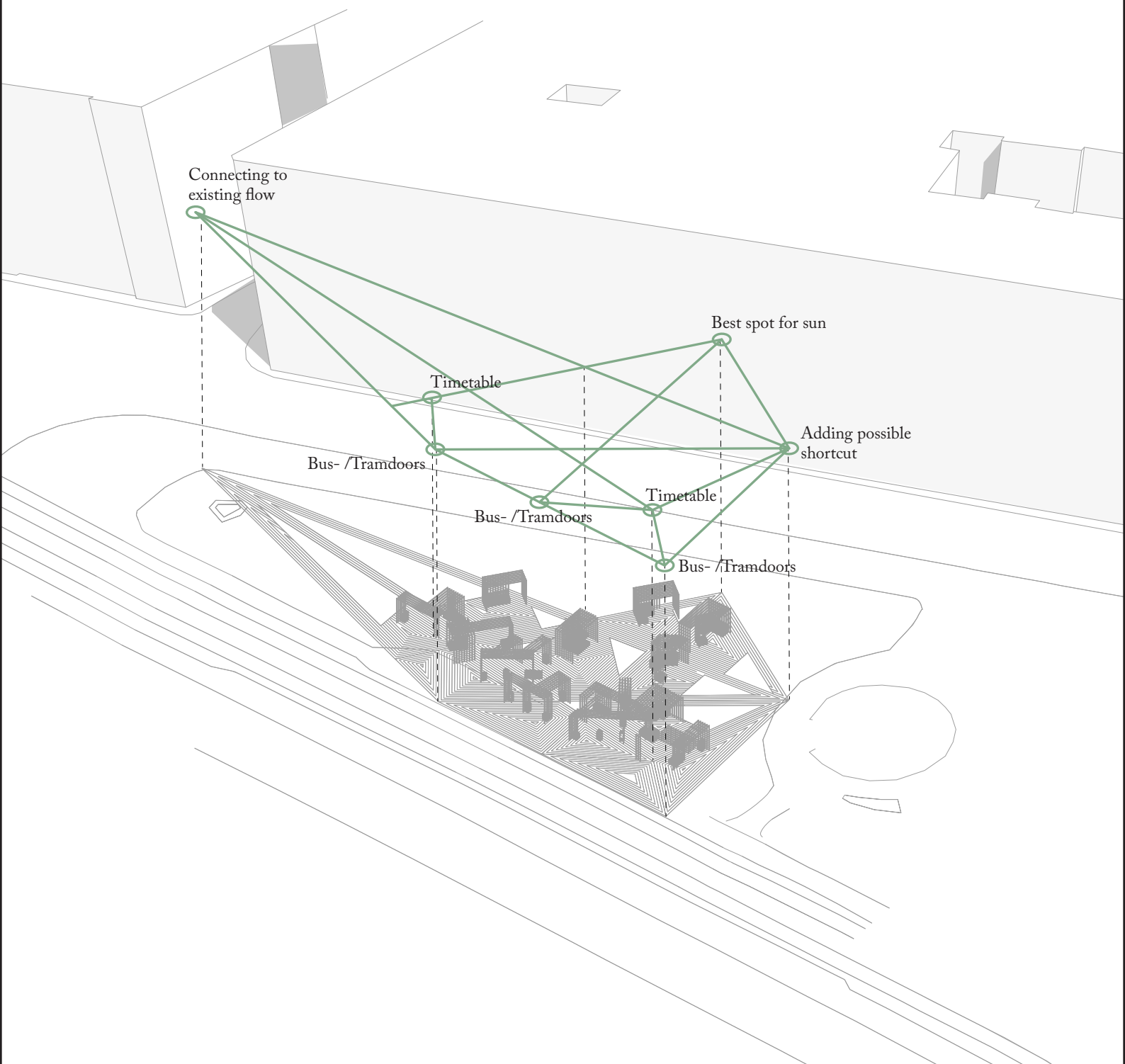
Adding shortcuts, connect to existing flows

Attractive spots at the site (water, tranquility, etc.)

Main trajectories to work with:

Where the bus and tram stops

Timetables



Positioning of Mode

Dependent on the different needs of each mode they are distributed at the site accordingly. Unsettled and Pre-settled are positioned in the proximity of where the timetable and bus are whereas Settled is positioned with regards to sun and tranquility.

Parameters Affecting Positioning:

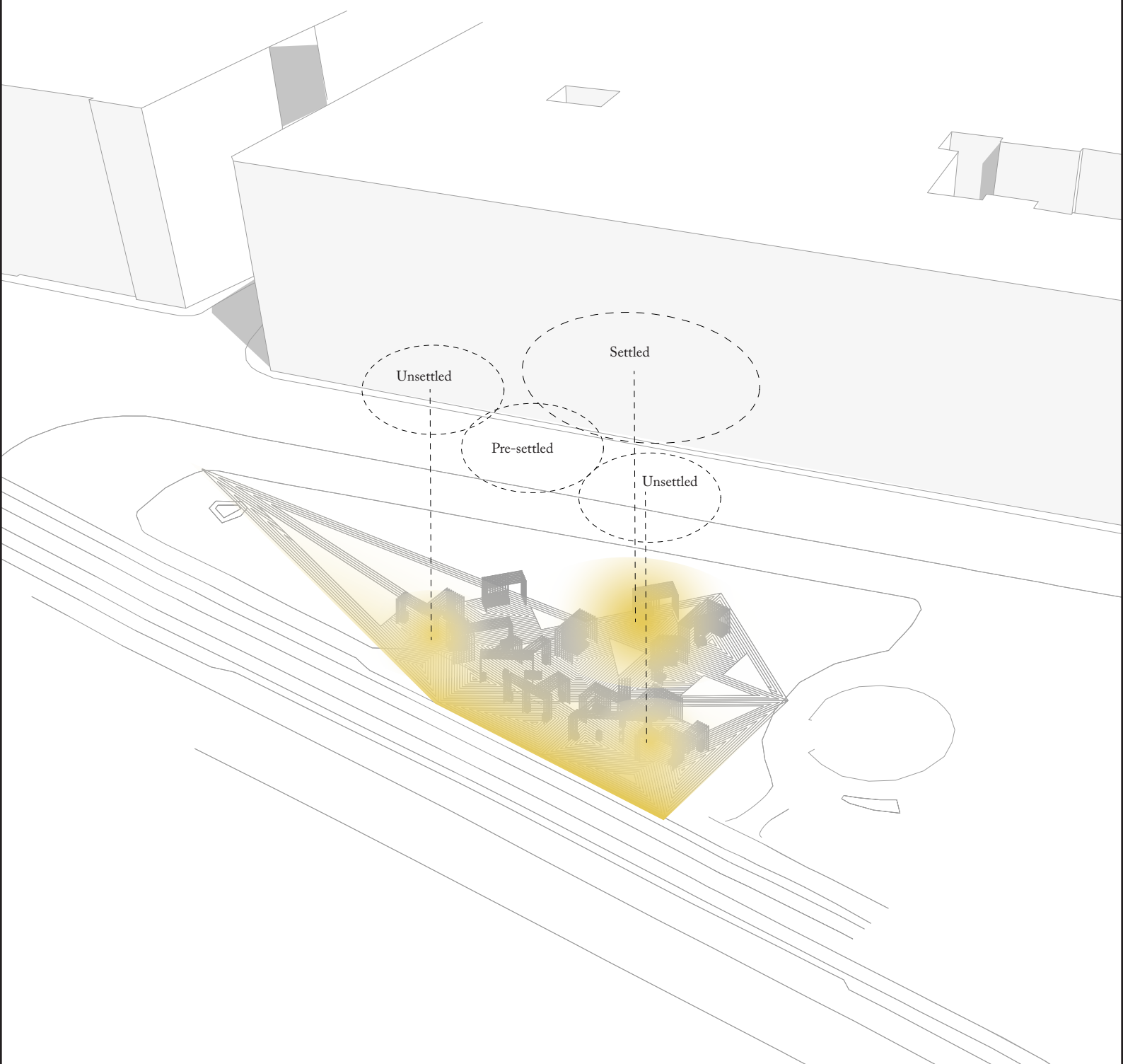
Where the busfront is

Sensitivity to external changes

Personal sphere

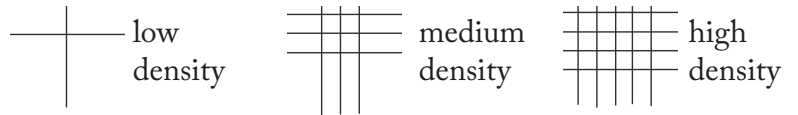
Trajectories

Timetable

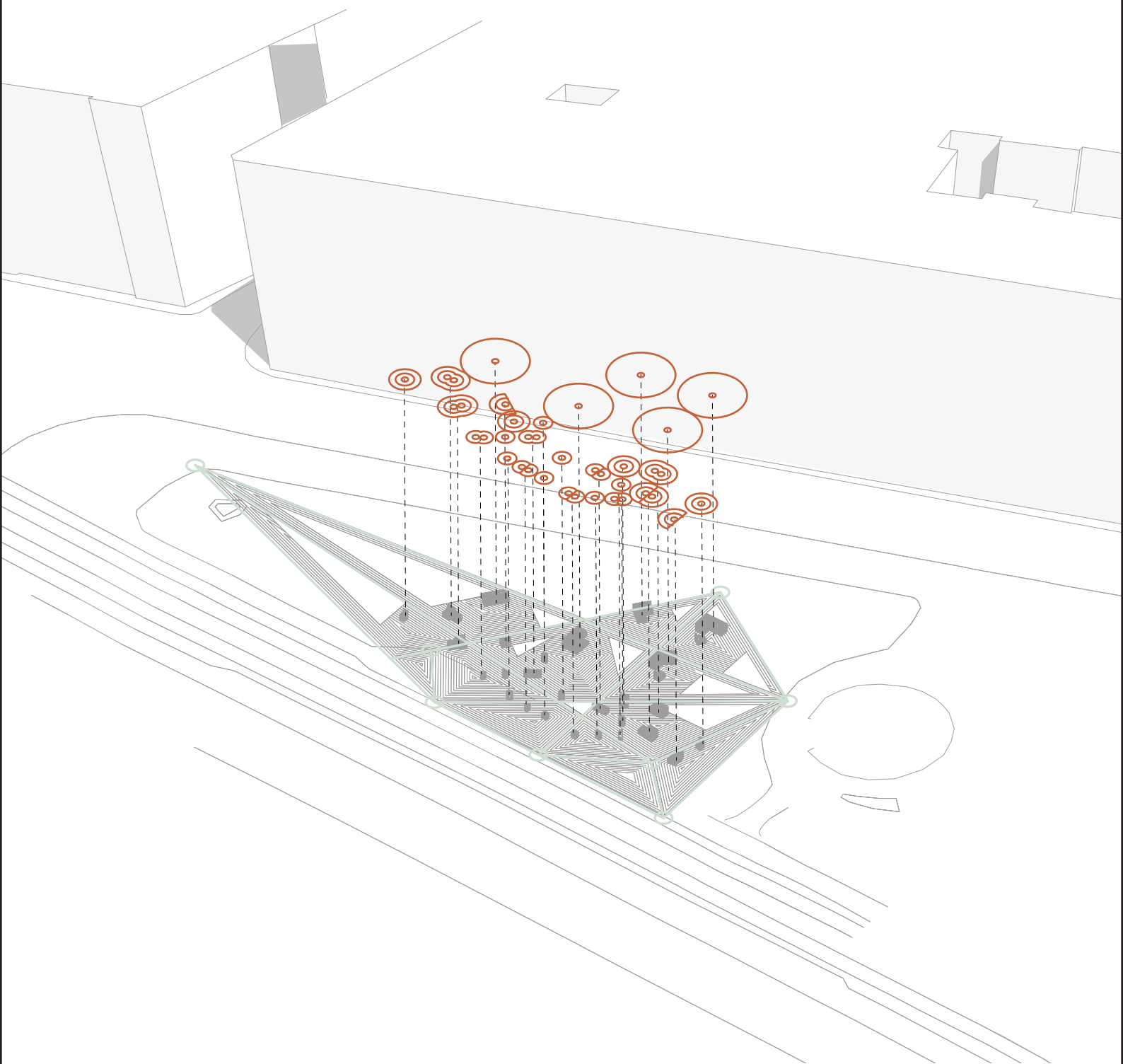


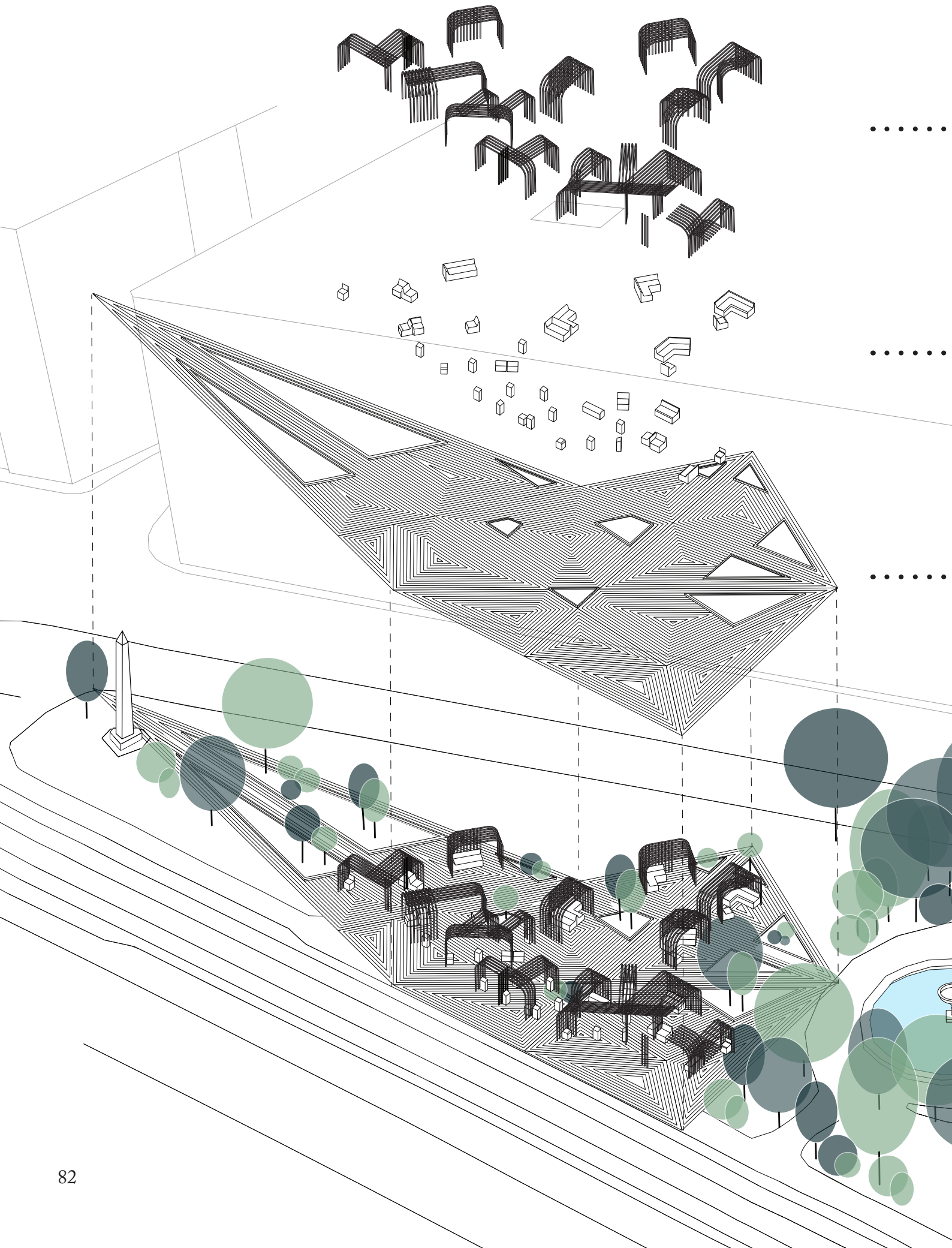
Density

Dependent on what mode you are in you have different preferences on how close you feel comfortable standing next to each other. These preferences are shown in how densely the site is furnished.



	<div> <div>low number</div> <div>high number</div> </div>			settled	pre-settled	unsettled	non-settled
	<div> <div></div> <div></div> </div>						
territoriality				4	2	3	5
braver in groups				-4	-2	-5	-5
personal sphere				-5	-3	-4	-5
stepping away				2	5	3	1
the perfect spot				5	2	3	5
reevaluation				1	4	5	2
movement				2	4	5	4
pacing							
	DENSITY VALUE			5	12	10	8





.....Roof:

Is made of Accoya wood like an entwined trellis. There is half see-through plexi plastic with led-lights in-between the trellis. When lit at night the stop appears like illuminated lanterns.

.....The Furniture:

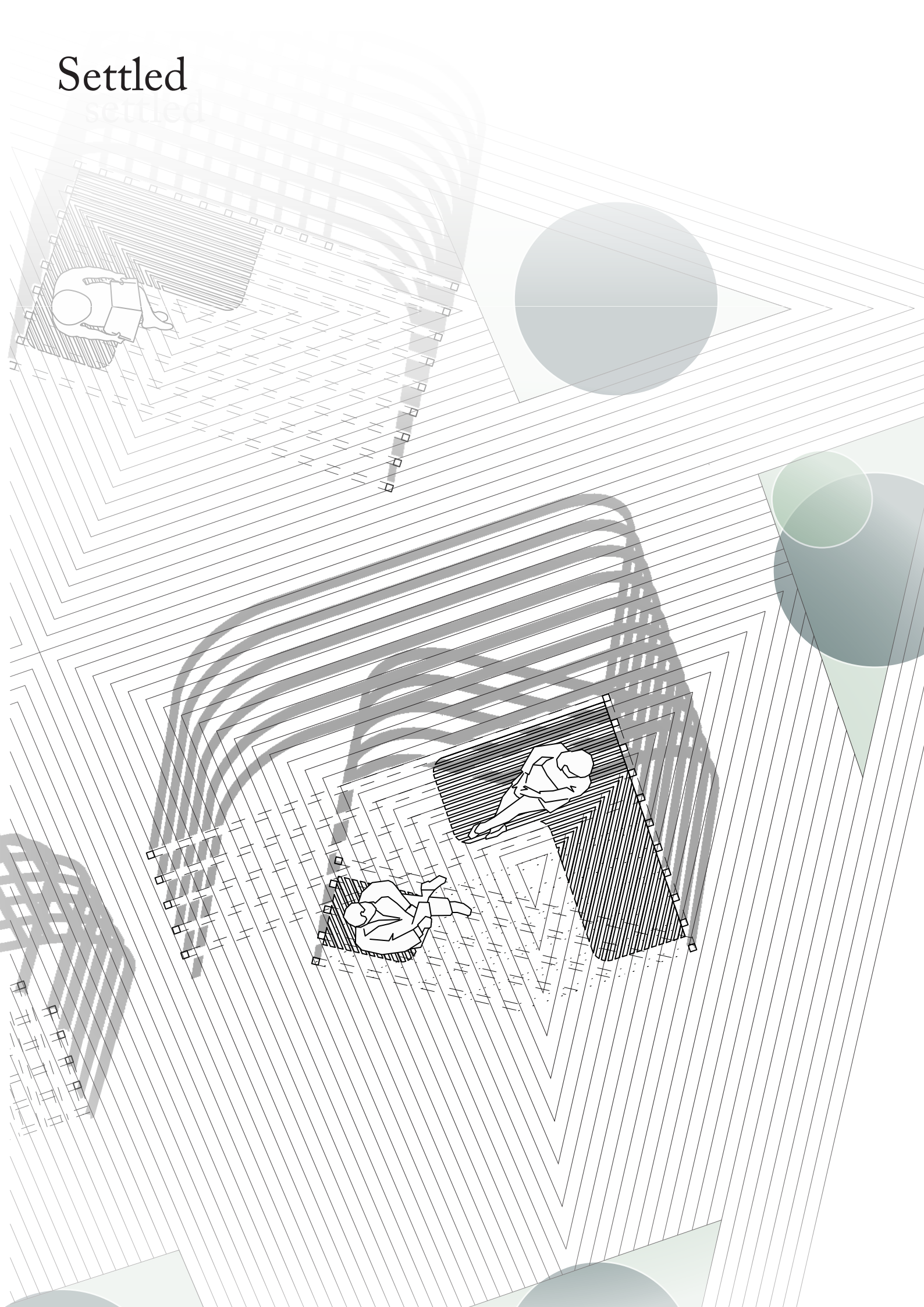
The furnishing is designed to fit the certain mode of each waiting zone.

Are made of Accoya wood supported by metal allowing the material to follow the silhouette of the furniture. Making them seem light and connects to the feeling of the roof.

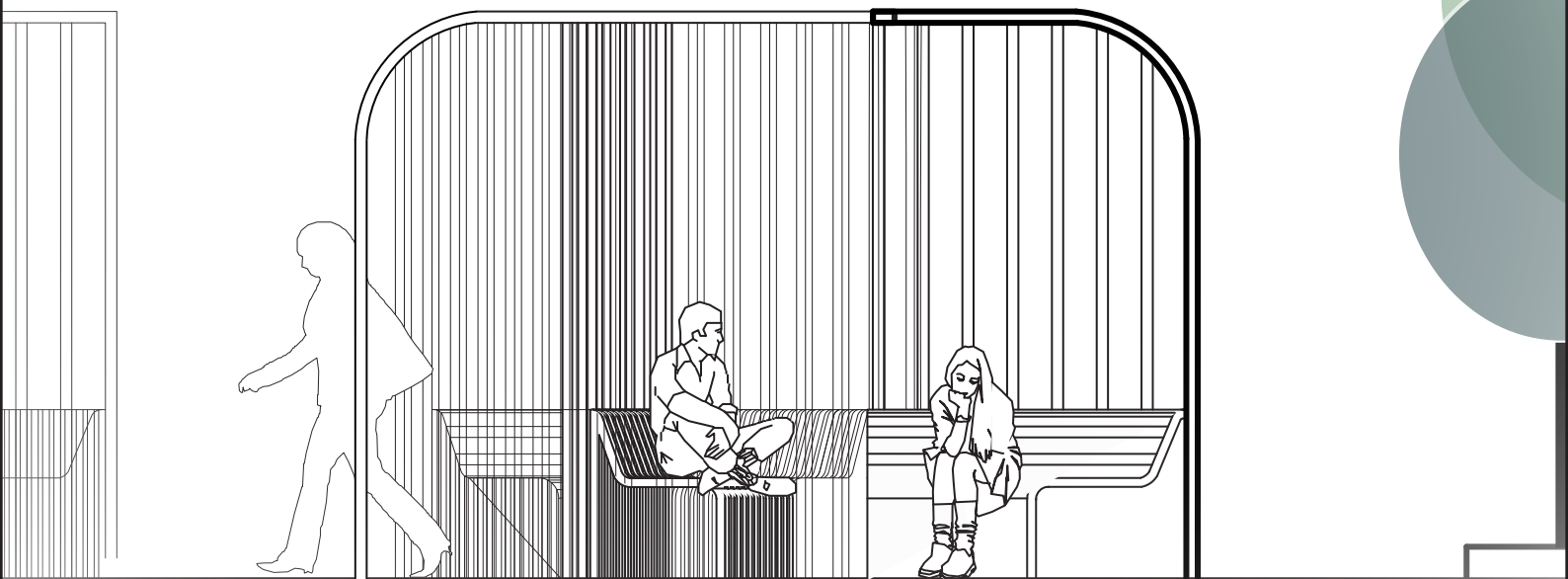
.....The Deck:

The decking is following the trajectory lines enhancing the flows at the site. The inbetween space substitutes the waiting zones.

Settled



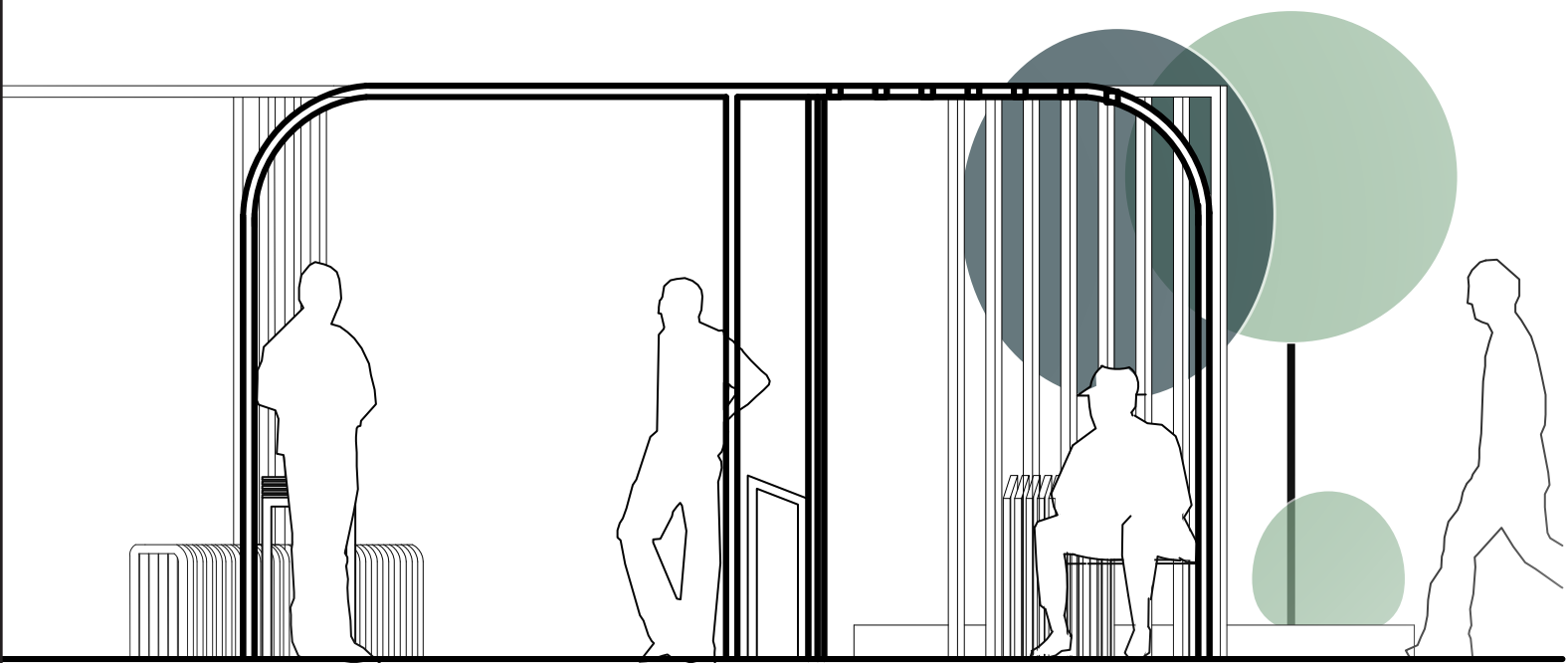
-Settled is the mode when you are waiting for something to end that are not really that important. It can be just waiting for your cigarette or your coffee to be finished. It is when the waiting is rather dependant on yourself, waiting for the sake of waiting....



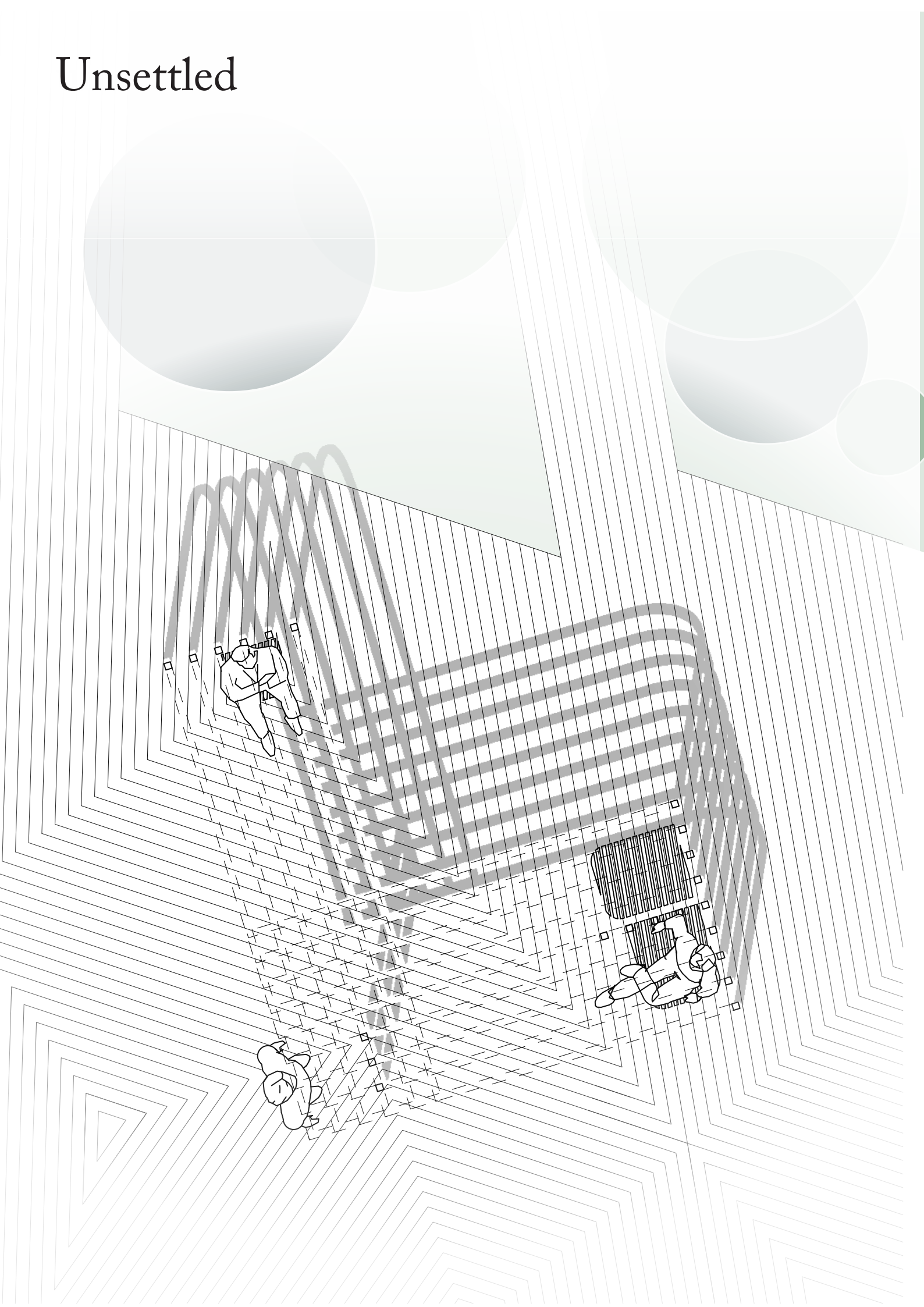
Pre-settled



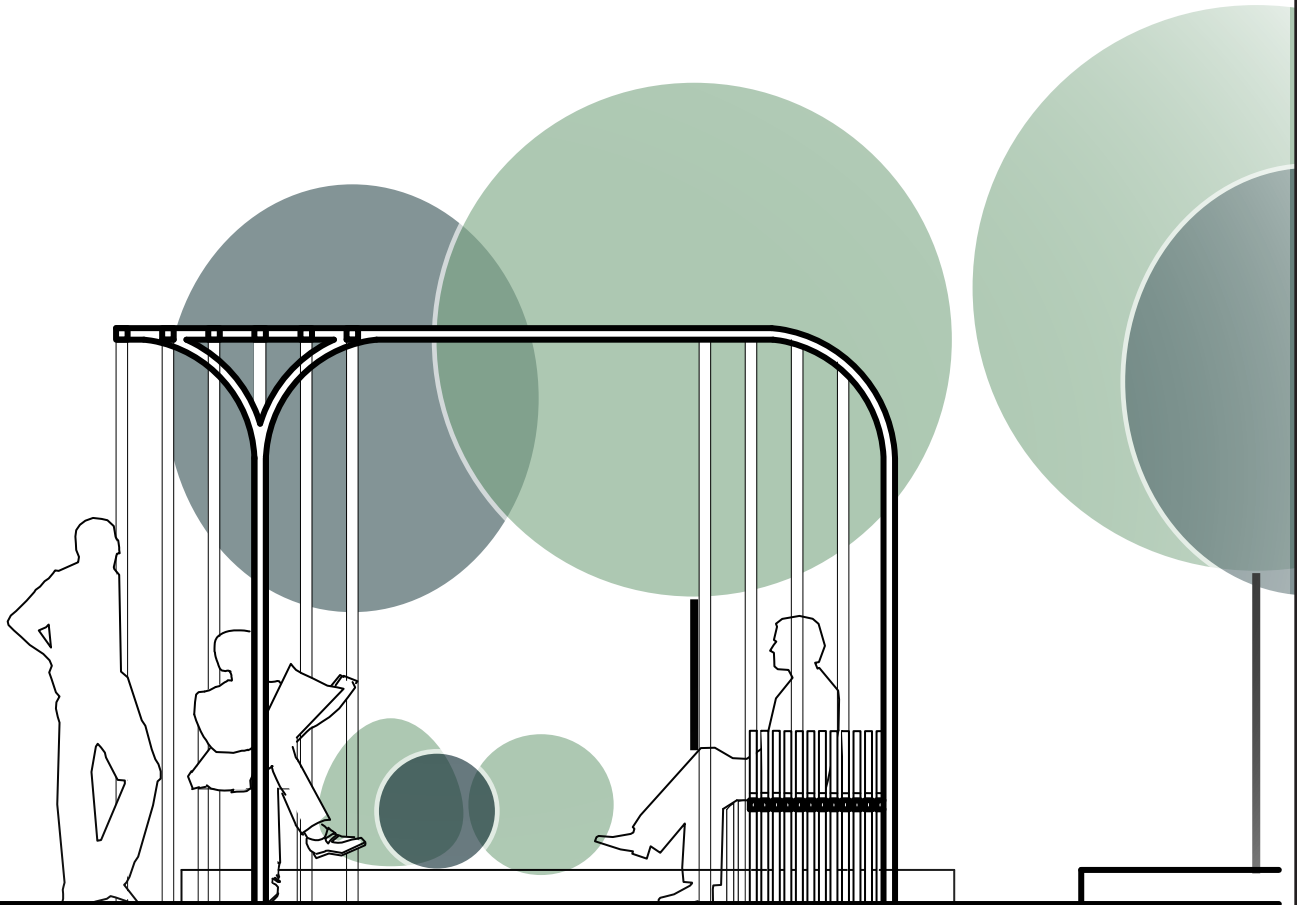
-Presettled is when your are waiting for something that you have a pretty good knowledge will arrive any minute.
It can be waiting for the bus or for a dentist appointment.
Anyhow you will not wait that long....



Unsettled



-Unsettled is when there has been a delay of some kind, the bus you are waiting for your is running late and there is no information at hand. Hopefully you will not be waiting long...



Discussion

My primary objective in this thesis was to question the way in which we perceive the activity of waiting as "useless time", and to point out how this is also reflected in the design.

I wanted to investigate whether a project with the starting point in the importance of waiting, and a view on waiting as an important part of daily life, would look different than what we see around our cities today. And if this shift in focus would create new models of how to design waiting spaces. The method was to study people waiting for the bus at busstops around Gothenburg but also an intuition-based model study, and naturally to read some selected literature. These three methods ran parallel to each other throughout the thesis work and affected it in different ways. The three work methods grew on relatively separated from each other with the consequence that the project, in periods, sprawled in different directions, with both positive and negative effects. In hindsight, I wish that I would have spent less time trying to decipher the bus stop studies, in the project; 'physical evidence', and instead worked more focused with the more intuition-based part of the project, which I now feel was more prolific.

Interesting would also have been, for example, to interview people about how they feel about waiting, positive and negative and thus find new routes of entry to a design method.

I hope my thesis raises questions of what a good waiting space is or could be, is there a value in the activity of waiting? Should we value the boredom of waiting, build rooms that might force us into reflection? What if all the waiting areas made it impossible for entertainment in the form of airtime? Is there maybe a value in forcing people to look up and see each other, a form of educational architecture which would force social interaction?

These questions have ultimately led me to the question of what is the role of the architect and what an architect perhaps could or even should do.

However, the main conclusion I bare with me from this project, is the lesson that no room should be neglected or uncritically built, all designed spaces deserve reflection since they set the framework of how we spend our lives.

A more critical approach and less routine in shaping urban space could create added value for all city residents.

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