

IMAGINING PUBLIC EXPERIENCE IN ROTTERDAM

ABSTRACT

In the period after WWII several damaged cities were entirely or partially rebuild using a modernistic vision¹. This has had great impact on the design of these cities' public spaces. Combined with the current state of modern life, it is suggested that these cities provide for a different experience of public life that might be poorer than that of public structures present in older city structures. This report investigates the conditions of public life in literature in general and as occurring in the modern city center of Rotterdam through analysis of its physical conditions and the experience of people itself, to identify the challenges and opportunities for improving this public life. Subsequently it proposes play behavior as a bridge to overcome the obstacles of public life in modern cities like Rotterdam. The role that play behavior can have to sustainably bind the public to each other and to locations that are currently underused within this area is investigated. By involving the public in different configurations as an active player and creator already in the earliest stages of the lifecycle of physical interventions in the public space - before the projects appear into reality – a sense of ownership over the result can be created. This benefits the social sustainability² of the interventions.

KEYWORDS: public participation, public space, underused space, modern cities, Rotterdam, play.

¹ Focusing on segregations of functions, functionality and circulation.

² The result being not only supported but also appropriated, maintained and altered by a group of people as big as possible.

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1 Introduction

The notion of modernity arose in the 19th century with the occurrence of capitalist industrialization. Rapidly changing technologies and the destructions that took place in WWI caused a rigorous rethinking of values that were present since Enlightenment. The 1933 architecture congress organized by CIAM in Athens has been influential in spreading and advocating the modernization of cities specifically. Many city structures were not up to date with the new ways in which its inhabitants lived and used their city. Zoning of functions, functionality and circulation were the main ideas that CIAM put forth for improving cities. After WWII, some of the heavily damaged cities in Europe decided to take the radical turn of modernity in their reconstruction program (for instance Mannheim, Livorno, Rotterdam).

In The Netherlands, it was Rotterdam that turned a disaster into an opportunity for change. An area of around 250 hectares in the center had burned down in a fire after a bombardment by German planes in 1940 (Stadsarchief Rotterdam, 2008-2016). Initially the urban planner that was charged with redesigning the city W.G. Witteveen designed a meticulously detailed plan that offered similar *“afwisseling, details, willekeurige variatie en sfeer”* [variety, details, whimsical variation and ambiance] as the medieval center that had disappeared (Vanstiphout, 2005). During the war however, in the void of power and chaos, local entrepreneurs and their architects coined a modernistic city plan with a great role for companies in it. When the time of reconstruction arrived, a modern city plan was decided. The former medieval city center was characterized by a dense urban structure consisting of a network of important waterways, small streets, alleys, market squares, slums and few monumental public buildings (see floor plans of fig. 2 and pictures in fig. 3). This was replaced by wide roads, segregated functional zones and repetitive building stamps that create various forms of open space around them (see fig.2 and 3). The modernism of the city has become Rotterdam’s main selling point and attraction for visitors and businesses. As such, even to this day Rotterdam stays true to its progressive and competitive nature³ and it continues to be a center of international innovations (Wols, 2015).

Unfortunately, already in 1968 local critique arose on these changes. In a survey among inhabitants Wentholt showed that the prevailing opinion on the experience of the new center was all but positive. Recurring statements declared the city center’s ambiance as uninviting and its overall outlook lacking a sensible scale (Wentholt, 1968). The origin of these negative perceptions can be explained directly by the urban and architectural setup of new modern cities. Levy suggests it is in these kind of modern city centers that *“a shift has occurred from a closed fabric, including central business districts and outlying suburbs in which the links between the different elements (plot, street, constructed space and open space) formed a system (the system of urban architecture), to a peri-urban fabric which is open and fragmented, with autonomous and atomized elements which do not relate to each other. This shift has been accompanied by a significant change in scale, with the appearance of imposing mega structures that are now only functional “* (Levy, 1999).

³ One of the earlier examples of this attitude: in 1449 the city, consisting of a mere 1200 wooden houses (compared to 6500 in Delft in 1400), started to build their first permanent structure out of stone; the Laurenskerk. Each citizen contributed with 3000 bricks to pay for his citizenship (Laurenskerk Rotterdam, n.d.).

The negative effects of modern urban design are foremost felt in the public life that occurs in its public spaces – the places shared⁴ with others (e.g. streets, roads, squares, parks). Fragmentation within the modern urban environment can even go so far as to create “*feelings of insecurity and vulnerability*” in its inhabitants (Ollson, 2012). Like that, the perception of the public sphere in its entirety is trembling. The emptiness of the main public square of Rotterdam, surrounded by big structures, is maybe a good example of such a modern public space that fails to be public (fig. 1).



Figure 1 The empty view on the Binnerotte, the main square of Rotterdam (own ill.).

The crisis of the public life in Rotterdam is also highlighted in a recent research on the experience of the city center in 2015. In the tradition of Wentholt’s 1968 survey, a population sample was interviewed and the conditions he introduced for a positive perception of the area⁵ were re-evaluated 75 years after reconstruction. Strikingly, the themes that involve inter-human relations need improving now even more than they did then (Börger, 2016):

- Creating a *lively public space* while retaining Rotterdam’s unpolished, adventurous image
- Allowing for *meeting* places in the city which is facing increased geographical, cultural and social segregation
- Being *inclusive and hospital* to its diverse inhabitants, not only to tourists and rich people

It is clear the current modern urban hardware of Rotterdam’s city center does not yet have the proper software for people to fulfill their public potential. Although the new Wentholt research shows the general directions for improvement⁶, no specific research has been done on what are exactly the types of public experiences that are present in this part of the city. The understanding such research would bring about, could be the first step to improving the public conditions within this hardware of the city. Participation of Rotterdam’s public in both the research methodology as well as the proposed design methodology at the end of this research is paramount to ensure they can be adopted in reality. This bottom-up approach could prevent dissatisfaction similar to that which was voiced after the 1968 survey.

Besides creating a more detailed image of public experiences that take place in the area today, as a direction for enhancing public life in this area I will investigate play behavior. As Stevens points out, play in the city “*is shaped by urban social conditions: the density and diversity of people, the mixing of their activities, the unpredictability of their behavior, their differing expectations and the unfamiliarity of their expressions all contribute to instability and ‘the dissolution of constraints’*” (Stevens, 2007). As such urban play behavior has the characteristics of Wentholt’s public improvement themes that have been unaddressed in Rotterdam’s center. This research will investigate how play behavior could be used as a

⁴ Or not share as an effect of segregated functions.

⁵ Concentration of facilities, visual attraction, lively public space, allowing for meeting and hospitality to all (Wentholt, 1968).

⁶ His main question in his interviews was: ‘What do you think of Rotterdam city center?’.

way to change the physical conditions in underused public spaces in Rotterdam. Henceforward I will refer to play behavior as 'play'.

This brings me to describe the main objective of this research:

How can the public life of underused public spaces in Rotterdam be revitalized?

To understand the problems of public life in the modern center of Rotterdam the following questions need to be answered:

What are the problems and potentials of experiencing public life in cities?

- *How does the individual relate to other individuals in the public space?*
- *What is the relationship the public has towards public space?*
- *How does the public move about in public space?*

What kind of public experiences does the modern city center of Rotterdam allow for?

- *What are the limitations and advantages of the physical situation?*
- *What types of memorable public experiences are occurring in the area?*
- *What are daily public uses of a specific location?*

How do you determine the public areas that are underused and have a potential to become good public spaces?

- *What are places in the area that have public disadvantages?*
- *What are places in the area that are of lesser public interest?*
- *What are places in the area that have public potentials?*

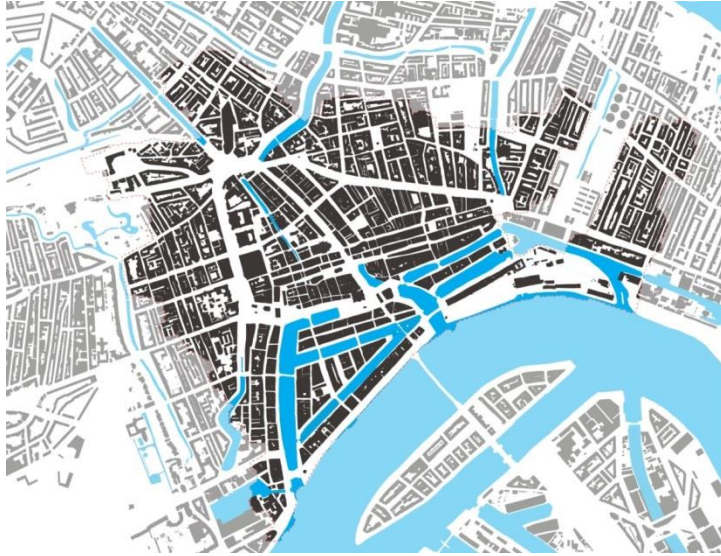
This section will first employ a theoretical standpoint to understand general problems of public life already defined in literature. To examine the exact public conditions of the modern city center of Rotterdam, an analysis of its physical elements, an empirical study among a sample group and an observation to verify hypotheses is executed. From literature and empirical study the conditions for improving specific public spaces will be deduced.

The second section will examine the potential solutions play can have in creating a more public space:

How can play and design improve public experience?

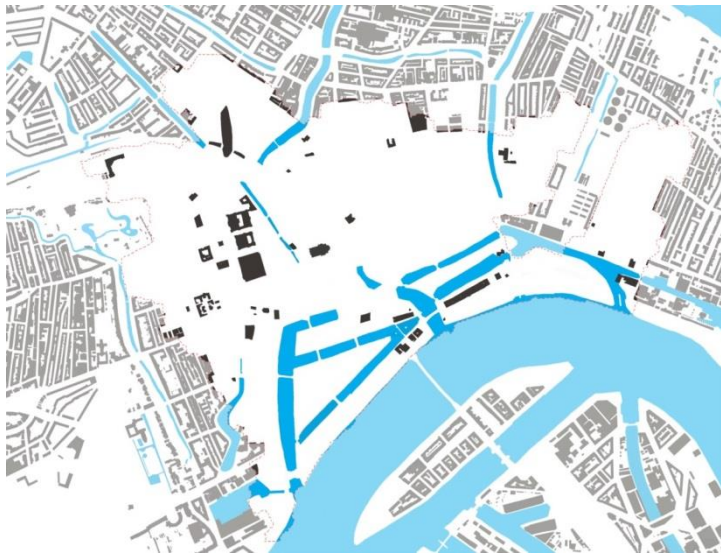
- *What are the conditions of play?*
- *What are the potentials of play for public interventions?*
- *What elements of designing are compatible with public play processes?*
- *How have design methodologies used play until now?*
- *How do cases use play in their design process to revitalize underused public space?*

This section starts out with theoretical explorations to analyze the potential play can have in improving public spaces already in the design process. Subsequently three case studies will serve to evaluate how play can be of use in revitalizing underused public spaces.



Before 1940

Existing or previously dampened canals create the boundaries of build blocks. Within these blocks only little space is left empty, mostly shaping narrow alleys and streets as secondary traffic space. The few spaces that are left empty are mostly accessible to the public and used for public functions (squares for markets for instance). The surrounding urban fabric is clearly woven less dense, with much more open space. This corresponds with the way a medieval center grows.



Right after fire 1940

The fire spread and left few buildings unaffected. Some of these remaining few were demolished still to make way for the new building plan.



In 2016

More canals are dampened, main roads and secondary roads are widened, more apt for increasing traffic flows. The blocks form patterns of fixed or repeated building typologies suited for their respective functions. The new fabric has much more open spaces even outside of the roads, but they seem mostly enclosed by the surrounding buildings, making these spaces less inviting or not accessible for public use. Few of the remaining open spaces are clearly defined as known public spaces (e.g. squares). Other than being opened up a bit more from the inside, the fabric around the new center has not changed much.

Figure 2 Urban fabric of Rotterdam effected by bombardment 1940 (own ill.).



Canal and street

Then: a canal bordered by a public street and a block that has both houses and shops adjoining the street. Today: canal is bordered by a commercial 'passage'; only cafes touching the water and above that repetitive housing blocks. The connection to the water got privatized.



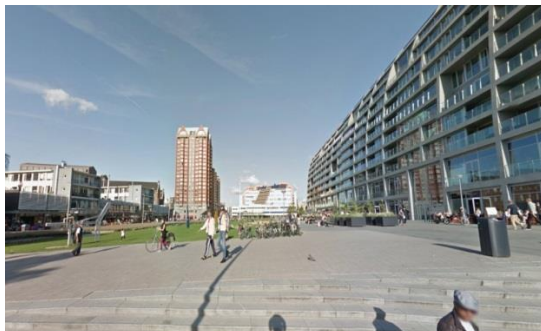
Street

The lack of private open space caused many to use the public space as a place to do their private activities. These public spaces being small, made people to share and be close to each other on a regular basis. Now one shares the street mostly with cars.



Street and square

A street as described before is replaced by a square surrounded by 3 separate functional buildings. Lacking other incentives for regular inhabitants to be in this area, it is most likely this square will only be used by the office clerks.



Square

The square on this spot has become much bigger. Compared to before however it has little elements to sit on, nor coverage from the gazes of others and the massive buildings that surround you while taking a rest.

Figure 3 Images of Rotterdam before 1940 (Stadsarchief Rotterdam, 2008-2016) and now (Google Maps, 2016).

2 The conditions of public life in the center of Rotterdam

In this section the current conditions of public life in the modern center of Rotterdam are evaluated to bring forth areas that can be improved as well as directions that will inform on how to improve (for the next section on using play as a solution).

2.1 Theoretical explorations of the public experience

What are the problems and potentials of experiencing public life in cities?

- *How does the individual relate to other individuals in public space?*
- *What is the relationship the public has towards public space?*
- *How does the public move about in public space?*

2.1.1 The public experience in the city

How does the individual relate to other individuals in public space?

Public life in the city provides for a different social setup compared to small towns. In towns the inhabitants often know each other. Knowing others is often accompanied by interacting. When this interaction involves *sharing* of multiple traits in whatever form, a group of people can be identified as a 'community'⁷. Sharing in small towns is much intertwined. In the reality of cities one can still speak of communities, but as your activities spread over a wider area in different centers, a community becomes a deep temporal connection to others occurring in different physical areas (for example school, work, frequented sports, family).

In the city there is not only a multitude of groups that could be identified in some way as a community by what they share. There are also specific events that are targeted at groups that *think* the same way about a matter⁸. These people gather in what is called 'parochial realms'⁹. Besides the same ideology on a topic, you do not necessarily share anything with the other. The intent of the events of parochial realms is also not primary to create a tight relation of sharing different facets in life like in a community. These realms can create for the individual "a peace of mind" knowing they have something in common with other individuals (which could be the starting point of an interaction), but since these other individuals are unknown beyond that, there is also no pressure to engage with them.

⁷ Unfortunately this word has become popular in recent American context as a vocabulary for differentiation of (mostly deprived or marginalized) groups- differentiating communities upon race, gender, ethnicity etc.

⁸ For instance festivals, shops and protests where people gather due to similar preference or dislike.

⁹ The idea of parochial realm is used by Lofland to distinguish the level of intimacy of the relation (Lofland, 1998). He distinguishes the private, the parochial and the public realm in order to map and compare them between cities. Lofland however, uses parochial to depict interpersonal network of relations (neighbors and acquaintances), private realm for the personal network relations and public for the relation to strangers set on "the street" (Lofland, 1998). I use the term parochial to describe the relation between like- minded people with otherwise weak ties or merely tactical affinities (for instance festivals, skaters).

The last level of engagement to others that is present almost solely in a city compared to towns is the relation with total strangers. This is a specific condition where you are surrounded by people of whom you do not know what they can mean for you (sharing), or what they think. As Lofland suggests, cities are the only place that all of these realms exist simultaneously: *“As the city emerges, so does the separate and quite discrete public realm. In the city, when one leaves private space, one moves into a world of many unknown or only categorically known others (biological strangers), many of whom may not share one’s values, history, or perspective (cultural strangers).”* (Lofland, 1998)

The effect of not knowing each other brings about a specific code of conduct that seems to be innate to city people: taking proper distance, not talking to others. By some this might be perceived as antisocial, rude or cold behavior, but in fact this apparent indifference is a social rule of the city which for some is the source of the positive city experience of freedom: *“The indifference of others potentially affords wider rights to and freedoms in the city. Such relations of indifference may be fragile, grudging, uneven, but they also can be seen as ethical in inscribing an attitude, however minimal, of the self in respect of others. Alongside an active politics that recognizes differences, that is, there lies an ordinary urban ethics that looks straight past it.”* (Tonkiss, 2005).

In conclusion, the conditions of a city allow for a public experience which can be defined as ‘experiencing the otherness present in the surrounding’. If a truly public space should be designed then, where all people are welcomed¹⁰, the different effects of the unknown on different individuals should be considered. Taking into account that an unknown other can be a source of fear for some (unexpected malicious behavior) and a joy for others (to explore¹¹ or to be free from ties), in a design something should be done to install trust and comfort for those at fear whilst still allowing for the private experiences of freedom that some like to have in public space.

¹⁰ Considering the inclusiveness, meeting and livelihood that were improvement factors for Rotterdam in the 2015 Wentholt research.

¹¹ Lofland summarizes some successes of leading social researchers in proving the positive relations that can exist in the ‘impersonal world of the city’. Gregory Stone shows interactions that occur between merchants and customers being full of “meaning and feelings”. Jane Jacobs discovered the parks and streets covered with “rich and complex acts, actions and interactions”. Erving Goffman demonstrates that “the same concern for the fragility of selves that is operating among participants in a family gathering is also operating among strangers on an urban beach.” William H. Whyte confirms the findings of these authors and starts to argue the indispensable value of these city interactions for the life of the city, locating it in city centers: “This [public activities] is the engine, the city’s true export. Whatever makes this congress easier, more spontaneous, more enjoyable is not at all a frill. It is the heart of the center of the city.” (Lofland, 1998)

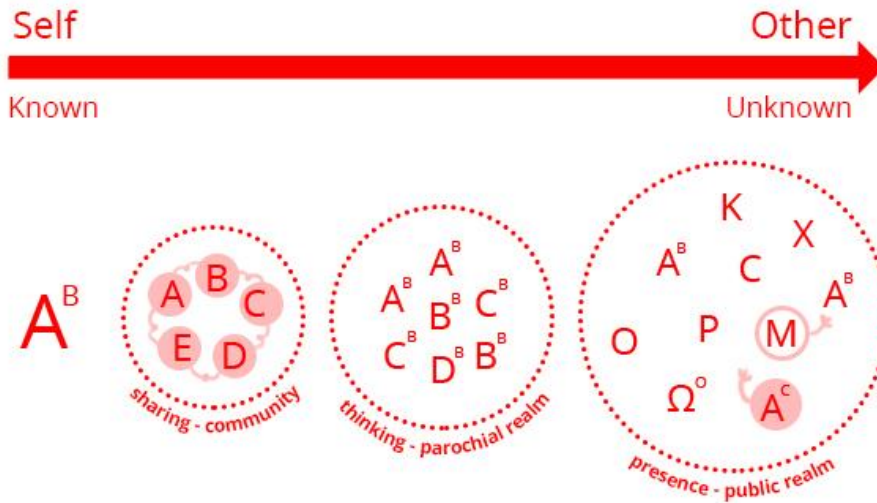


Figure 4 Relationships of individuals with others in the city (own ill.) The capital letter depicts the appearance and physical presence of the individual and the superscription its thoughts. Throughout life in city one moves in the different spheres intimate relations of self, community, parochial and public, which corresponds to the level of knowledge about the 'other'.

2.1.2 Public space and the public

What is the relationship the public has towards public space?

Besides social implications, not knowing can also have consequences for the way we interact with the spaces that are public. Whether or not we use a public space extensively can have several dimensions relating to uncertainties of not knowing: ownership dilemma, governance of behavior, the intentions and desires of others in the space, the uncertainties of the future.

The first two deal with the rights and responsibilities of the public to the public space and its facilities and will be explained here using a division generally used in economics that expresses our relation towards objects in terms of rivalry in consumption and excludability (Mankiw, 1998):

		Rivalry in consumption	
		High	Low
Excludability	High	Private goods (private realm)	Club goods (parochial realm)
	Low	Common resources (communities)	Public goods (public realm)

Public space as a facility for all to enjoy, includes the things that are hard to exclude people from (e.g. the sun) and often are the things that are plentiful and therefore have little rivalry. The valuable things often get excluded from public enjoyment if possible, so that the ones that have created it can enjoy the benefits of their efforts. This can be rooted in greed or a preventative measurement against abuse of

freeloaders or people that overuse the facility¹². The desirability and the possibility to exclude, create their own behavior codes towards spaces:

		Rivalry in consumption	
		High	Low
Excludability	high	Private space and facilities - Use and adapt by your own liking. Maintain yourself.	Parochial space - Use and adapt according to the consensus of interest group. Maintenance is included in the costs.
	low	Communal space - Use and adapt in consensus with (interests of) other owners in group. Maintenance is often divided.	Public space - Use and adapt it as long as it doesn't obstruct public interest (other public users and uses). Maintenance is done by external government with costs of tax.

Overall the absence of a feeling of ownership over the public facility could cause a decreased connection and use of the space. This does not benefit the inclusiveness, liveliness and meeting in the public space that needs to be improved in Rotterdam.

In conclusion, the paradox that public space is owned by everyone and no-one in particular causes only few individuals or groups to use the public space in an extensive way. An addition reason could be the time spent in public spaces versus private spaces. Lastly also the facilities that are present to use on the spot versus the effort of bringing your own stuff can be a reason for not using the public space.

In addition to the design task being to increase the useful facilities, to prevent the problems mentioned a diversified sample of users could be asked to participate in the creation of the design project to create a sense of ownership. When you have made something yourself, you are much more respectful towards maintaining the result. When these use elements in public space can change, grow and be adapted over time, more people can be included in the making process to increase the general ownership relation among the public. To diminish the impact of fear among the participants that their work would be molested, the interventions can be constructed with low-cost materials or funded by an external party. All these measurements could transform the public into active makers, users and maintainers of the public space.

¹² Mankiw describes two main problems that exist in these user relations of goods from an economic perspective. Both of these relate to the depletion of the resources that are hard to excludable from people (public goods and common resources). For public goods, the "freeloaders' problem" is mentioned. This is when someone that does not contribute to the good (generally paid for by taxes), makes use of it or abuses it (in such a way others cannot use it). To solve this sometimes these public goods are transformed into common resources. This is however where the second problem occurs, called "the tragedy of the commons". Traditionally the 'commons' was a shared place where everybody could hold their sheep. The tragedy refers to the situation that any individual can endanger the benefit of the group by deciding that if he/she takes one more sheep to herd on the space, it won't harm, thereby (in case many individuals think like that) actually destructing the value of the common resource – the soil and food for the other sheep.

2.1.3 The public state of presence

How does the public move about in public space?

Hannah Arendt talks about public life being governed by ‘action’: being words and deeds between humans¹³ (Arendt, 1959). She attributes action as the main causes of the phenomena that occur in public life. Examples of these phenomena she names: contingency (many possible but uncertain consequences of action) and irreversibility¹⁴. Another one is what Baird calls ‘plurality’: as we aren’t able to see our own persona, the presence and interaction with others becomes a way of figuring out who we are through others (Baird, 2016). Arendt addresses an important notion with this theory, namely that the public realm is not a place of passiveness, but automatically something happens between people in public space.

Walter Benjamin, in 1936, has written about how modes of production (and mostly reproduction) of art have influenced its reception (Benjamin, et al., 2008). In this piece he distinguishes two modes of presence in which people receive art, namely either in concentration or distraction. Concerning the state of reception of architecture he notes architecture as the principal example of experiencing in a state of distraction. He explains it is through use (tactile) by way of habit and in perception (optically) by casual noticing that we receive architecture. He even values the state of distraction caused by tactile experience so much as to claim only through these experiences a greater understanding can be achieved¹⁵. He makes a point of the limits of our visual apparatus while in public space and much more so while being in a moving state.

Richard Sennet distinguished two kinds of public spaces with their own kind of public presence: ‘synchronic’ and ‘diachronic’ public spaces¹⁶ (Sennett, 2016). Synchronic public spaces are places “*where many things happen at the same time*”, it is “*fragmentary: no linear line that tells you what to do*” and by being so is “*disorientating from the self*”¹⁷. This corresponds with the image of distraction that Benjamin contributes to receiving architecture. Diachronic public spaces on the other hand are places of “*focused submission of the public*”. They are settings that stage a specific kind of public behavior¹⁸. Sennet is quick to add the world is in need of more synchronic public spaces that allow for

¹³ This is part of her theory of division of human activities. She describes that the human *vita activa* (active life) (as opposed to *vita contemplativa*) consists of three sorts of activities: labour (meeting biological needs, dealing with consumer goods), work (dealing with the creation of durable goods – for instance tools and art) and action (words and deeds between humans) (Arendt, 1959).

¹⁴ She suggests promises can reduce the potential negative effects of contingency and forgiveness for irreversibility.

¹⁵ “Under certain circumstances, this form of reception shaped by architecture acquires canonical value. For the tasks which face the human apparatus of perception at historical turning points cannot be performed solely by optical means – that is, by way of contemplation. They are mastered gradually – taking their cue from tactile reception – through habit.” (Benjamin, et al., 2008)

¹⁶ Synchronic literally translates to ‘with time’ and diachronic to ‘through time’.

¹⁷ As an example of a synchronic public happening, Sennet names a walking crowd.

¹⁸ Examples of diachronic public settings: theatrical performance, a sitting crowd, facebook.

differentiation. This seems a plausible claim consideration the real nature of publicness lies in being present among others. When all are not aware of each other in case of submissive activities, the full potential of publicness is not exploited.

George Baird combines the two theories of action and distraction: there is a range of self-consciousness that bodies in space can perceive when in proximity of other bodies— from a low self-consciousness in a distracted state to a high level of self-consciousness through others in a state of explicit action¹⁹ (like political acts) (Baird, 2011). The diversity of examples in this range is not so much bound by the space (synchronic or diachronic public spaces) only in the sense that it must allow for the presence of the other at different distances.

In conclusion, it can be stated that the presence of others at different distances can bring about different (re)actions that decide our consciousness of the environment and ourselves. The more we engage with the other in synchronic spaces in a state of active awareness, albeit sometimes slightly distracted by the diversity of activities taking place, the more we shape the image of ourselves through the reflection in the other. For revitalizing underused public spaces, the importance of the closeness of people and the possible actions this brings about, should be considered. Striving for the creation of primarily synchronic places would create the conditions for people to become aware of each other, allowing for the liveliness and meeting that from the 2015 Wentholt research seems to be missing in Rotterdam.

2.1.4 Conclusion

What are the problems and potentials of experiencing public life in cities?

In the theory explored, three dimensions show to have different negative sides that should be addressed in revitalizing public life in public spaces. This should be done while retaining some specific urban public qualities that are experienced:

Cities allow for a specific social setup where we engage in different realms with people we know, but in which the main characteristic of public life in public spaces is the presence of the unknown other. This creates feelings of unease for some and the feeling of freedom for others. The task of improvement would be to decrease social unease while still allowing for the freedom of others.

The fact that nobody owns the public space, creates decreased incentives to do something in it and with it. Therefore, it is favorable to decrease the imagined effects of insecurities. Suggested increased sense of ownership is involvement in making the interventions. To decrease the negative prospects of

¹⁹ He classifies: bodies at rest – in repose or distracted – unconscious of our respective bodies in space; watching – the beginning of consciousness of others in space – focused optical observation; watching and being aware that one is watched; speech – discourse in the parochial realm; performativity - action in public generated by awareness that you are being watched; attraction of body to body – the formation and growth of a crowd; parade – an institutionalized performance; quarrel – speech and dispute – politics of contestation; protest – parade as a political phenomenon; riot – political act in public space turns into violence (Baird, 2011).

demolition, interventions could be made with methods that have a more temporal nature and are inexpensive.

The presence of many stimuli that are moving all the time can cause people to be in a distracted state in public spaces. The presence of others on different distances has different effects on our interaction with them. Generally speaking it can be said the closer, the more likely that plurality occurs. In that case besides a raised awareness of the other around you, the self-awareness rises also. It seems more favorable to design for public places that aim at making diverse public experiences happen - synchronic public spaces- so people can really get in contact with each other.

2.2 The current conditions of public space and experience in the center of Rotterdam

What kind of public experiences does the modern city center of Rotterdam allow for?

- *What are the limitations and advantages of the physical situation?*
- *What types of memorable public experiences are occurring in the area?*
- *What are daily public uses of a specific location?*

2.2.1 The physical conditions of public space

What are the limitations and advantages of the physical situation?

Functional areas

The surrounding functions that are present in an area mainly decide the people that come in the adjacent public spaces. Analyzing the spread of and mixing of functions in the center of Rotterdam then, could indicate public areas that are more or less likely to contain multiple users throughout the day. In order to find places with a 'good mix', I consider workpeople (offices, institutions, services or shops) and inhabitants to be the two extremes in the occupation of public spaces at different times of the day. Public spaces that intend to be lively spaces that make diverse groups of people feel welcome and that allow for meeting of others (in tradition of Wentholt), should be preferably adjacent to areas of mixed use. Note mixed use is only used as an indicator for the people that are present in public space. It is not connected to prevailing contemporary discourse against or for stimulating 'mixed use' to increase economical revenues of city areas²⁰. Figure 5 shows blocks in the center that have a mix of inhabitation

²⁰ In the recent history of urban planning, the search for a more sustainable city got stimulated by the rejection of the CIAM functionalism. The main reaction seeks to (re)create an ideal of 'the old traditional life of the European City stressing density, multiple use, social and cultural diversity' (Commission of European Communities, 1990). Definitions, means and methods remained quite diverse as well as the agreement on their effectivity and meaning in the setting of the post-war social and economic restructuring of the cities (Breheny, 1996). At the end of the 20th century, the idea of a compact mixed use city gained interest with the emergence of an 'urban idyll': the city 'inhabited by consumption-oriented sub-cultures' and adopted these ideas in 'response to the new economic reality of SMEs, services and creative industries and a new urbane population' (Foord, 2010).

and other use touching ground level in hashed gray. Extra information on inhabitation density can be obtained in appendix A.



Figure 5 Blocks only residential in black; mix of residential with other functions on ground floor hashed in gray (own ill.).

In this map, the functional segregation that is applied in the modern plan is apparent: clear areas where nobody lives as well as areas only intended for living. If we mark the public areas around and between the mixed functions blocks, we create an image of the places that are likely to contain diverse users (both inhabitants and workers and probably visitors). In these places then there is an increased chance of meeting others (see fig. 6).



Figure 6 Areas with potential of meeting the other: the public spaces between mixed used building blocks (own ill.).

Physical accessibility

Besides the likeliness of a diverse public being present in the public space because of the surrounding functions, the design of the public places and the official regulations decide if everyone is welcome in the space that is not private. Borders of exclusion to space are either physical (closed doors or walls), or are less forcing but rather suggesting a desired use or specific users (high bushes, fences). More on the use of soft borders (not buildings as borders) in the next section.

To get an insight in the places that are accessible to the public, I follow the tradition of Giambattista Nolli's plan of Rome, *Pianta Grande di Roma* of 1748. Nolli made use of a map by Bufalini, which depicted the build space as black blocks. The important and characteristic alteration he made to this however is the inclusion of public space (subtracting these from the black build blocks, the inaccessible space). In his maps, we can see the inside of public buildings represented as open space. Also other build structures and elements within the public space are marked black in his map, like public arcades (figure 7). This way of mapping the city then depicts the space that is accessible to the public and how this is structured by build elements.

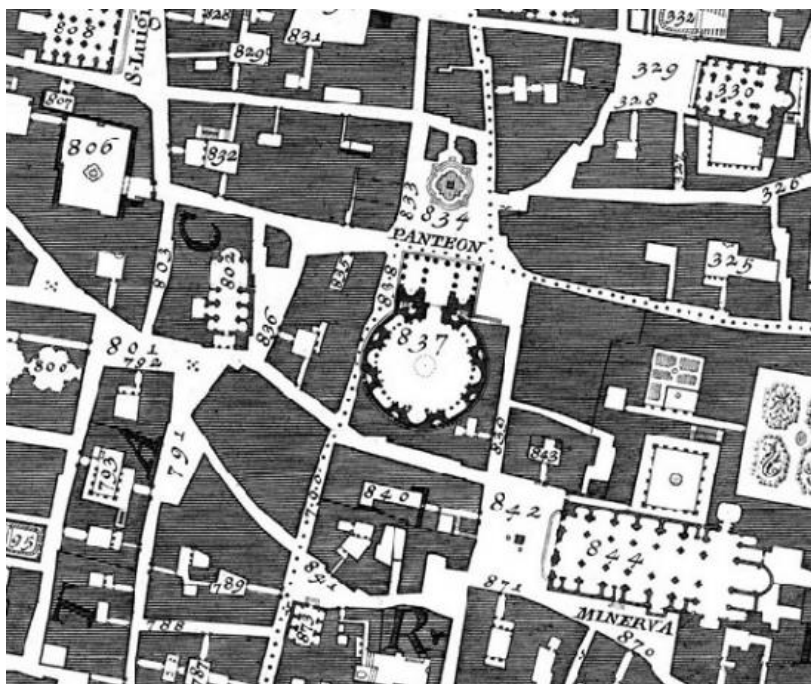


Figure 7 Sample of Giambattista Nolli's map of Rome depicting public space (Nolli, 1748).

Unlike in Nolli's map however, there need to be some added considerations. In the modern center of Rotterdam -that is characterized a lot of shopping areas- shops, services and buildings related to for instance the food service industry are also places accessible to the public. However the type of behavior that is expected of the public is restricted in these places: being there too long without making use of the services of the provider will not be appreciated (Amendola, 1997). This is not the typical public space where you have ultimate freedom to do what you please. In order to show these differences, within the

Nolli's legend for Rotterdam I have created a gradient. This legend and the map can be seen in fig. 8. A detailed zoom that shows the different areas and explains some examples can be seen in Appendix B.

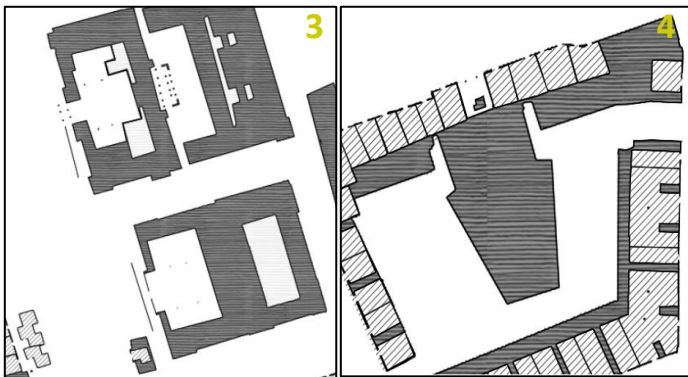
	Fire line	
	Public	Unrestricted access
	Semi-public	Access can be denied in case behavior revolts against function and rules of place
	Private	Access restricted to owners or selected intentional users by closed doors and barriers
	Private outdoor	Access restricted by closed fences or doors
	Water	



Figure 8 Nolli map of the area within the fire line of Rotterdam (own ill.).

Overall, we can see in the map, that there are very few public inside spaces (only the church, the library and the covered market hall). Secondary inside public spaces (not intended for staying), are main entrances and passages (examples in fig. 9). These are often small and surrounded by semi-private or private functions. Furthermore most of these are closed off by night. Besides inside spaces, the whole city seems to have a lot of open public space (white). However, much of this space serves the circulation of traffic²¹. To provide for the meeting, lively spaces and inclusivity is desired, it is valuable to select the places which are only accesible to pedestrians and bikes (see fig. 10). Only at a slow pace meeting is possible.

²¹ In the 1960's this focus on traffic had even penetrated in the mainstream vocabulary of public spaces in the Netherlands, which was more about a hierarchy of traffic and access, than about the places itself (Hoekstra, 2013).



1. Shopping passage 'Central Plaza' (Weena)
2. Police station entrance hall (Doelwater)
3. Town hall (top) and Post office (bottom) (Coolasingel).
4. Entrance cavity cinema 'Cinerama' (Blaak).

Figure 9 Examples of small inside public spaces (own ill.).



Figure 10 Areas only accessible for pedestrians, disregarding narrow sidewalks (own ill.).

In this map, we can see two main categories of pedestrian accessible space: islands (surrounded by buildings or by traffic) and networks of areas. The remaining forms of spaces between the blocks and the traffic and the effect that they might have on public perception, will be discussed in morphological analysis in more detail. And to further evaluate the possibilities of public use that are given in these public spaces of the fire line, the fixed elements within them will be mapped in the elements analysis.

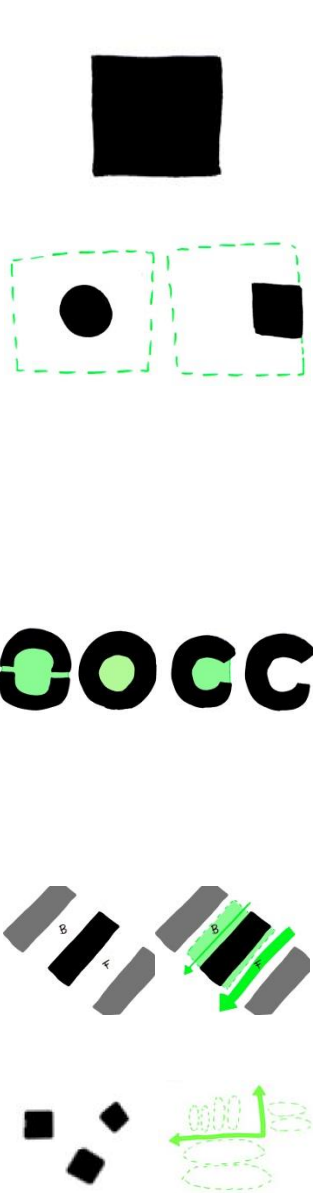
Public space as defined by the morphology of surrounding buildings

The relation of the buildings that are adjacent to these public spaces, defines whether or not one feels invited to use them. The relationship between open space and constructed space can be analyzed from different perspectives as shown for instance in the diagram by Levy (Levy, 1999): it distinguishes the plot, street, constructed space and open space (Levy, 1999) (see table fig. 11).

	Plot (P)	Street (S)	Constructed space (CS)	Open space (OS)
Plot (P)	P/OS	S/OS	<u>SC/OS</u>	OS/OS
Street (S)	P/CS	S/CS	<u>CS/CS</u>	OS/CS
Constructed space (CS)	P/S	S/S	<u>CS/S</u>	OS/S
Open space (OS)	P/P	S/P	<u>CS/P</u>	OS/P

Figure 11 Paradigms of morphological analysis according to (Levy, 1999).

In this analysis I will investigate how blocks are being perceived and what the resulting effect is on how public space is being perceived for public users. I know of no precedents that intend to do this, nor that deal with the scattered conditions of public space that is presented in the modern center of Rotterdam. Therefore, I made my own division based on observing all the building forms and open spaces that occur in the area. Arranged towards the freedom of movement the public has within the circumscribed public spaces (from less to more), I distinguish: massive urban blocks, enclosed blocks, embracing blocks, streets and tiny floating blocks. A review of the occurrence of these, their potential effect on the movement of people is described in the diagram below (fig. 12). Examples with pictures are given in appendix C.



Massive Urban Blocks – surrounded by roads and streets, form an obstacle to public movement. On ground floor level, we see that the blocks with more public interest (shops and those on the route to stations) do something for the walking public (overhang for shelter, colonnade). In the growing city, these were originally only buildings with institutes, shops. Later on, offices and housing emerged within this typology of mass.

Enclosed blocks – these may not be solid (and thus visually more open), but are still taking a lot of floor space from public use and function, a characteristic they share with the massive urban blocks. Therefore, they also become objects the public needs to walk around. Depending on the materialization (for instance a big brick wall, transparent fence or a wall of greenery), the view into the property (a garden, playground or industrial site) and the local weather condition (when raining there is nothing available that protects you), this can either be a pleasant walk, or a place that you would like to pass as quickly as possible. The examples that we find in the city are all institutes or places of work, which could be understood to have a less private demand to their outside space than houses.

Embracing blocks – are creating (almost) dead ends within them (while from the outside being perceived as a block). Mostly this space within is private, which is either formalized by a fence or only by a mere suggesting in the way the private building is surrounding the outside space. These can become parking spaces or inner (private) courtyards or gardens. This arrangement of closed space appears to be frequent for housing and would suggest a private demand of the space it surrounds.

Streets – linear narrow structure that has a front and a backside. It allows for a linear movement of the public. Within the fire line, we can find streets with a more private character because of their only function being housing within the block (which are often surrounded by private outside space), mixed blocks with shops on the ground floor and shops only.

Tiny floating blocks – are built structures that humans can move around in many ways. Possibly these blocks get perceived as objects (as they can be seen in one glance), and get more public attention because of that. Their function often appears to be exceptional: pavilions turned into shops (3), service structures)– sometimes turned into monuments or cultural amenity, and actual floating blocks boats.

Figure 12 Typologies of buildings surrounding open space in Rotterdam center (own ill.).

The buildings that are present in the center of Rotterdam create both advantages and disadvantages for public use (movement and staying) and perception (welcomed or excluded) with their shape. We can conclude that it is facilities that are provided for public like colonnades and seating (that are desired for instance when it's raining), that make spaces feel more hospitable when people are on the move. Some morphologies (the embracing block and the enclosed block) contain a lot of outside space, of which the latter has the potential to become a place of repose or a place for the public to stay, but often these spaces are closed off from the public by more or less friendly barriers (fences, walls, greenery or the

gazing eyes of private functions surrounding it). It is streets that provide for a one directional movement (suggesting diachronic spaces). Floating blocks seem to attract attention.

As the public space is a place of presence of the other, it seems this demands the morphology of an improved public space where people can be together (they are not forced to move). This implies providing for functions to use (shelter and sitting) and not feeling exposed towards an excessive gaze to increase comfort.

Considering the city network available, I propose a street structure that has side 'escapes', i.e. that open up in bigger spaces not surrounded by private uses, in order to provide for the rest and time needed to explore the other. Looking at the areas that provide that potential of encounter in rest, we have the borders (marked in red in figure 13) of the spaces where a mix is present (green) with areas that are still accessible by foot (bleu). Complying with the morphology suggested, are areas in the center with the connected network of solely pedestrian accessible areas.

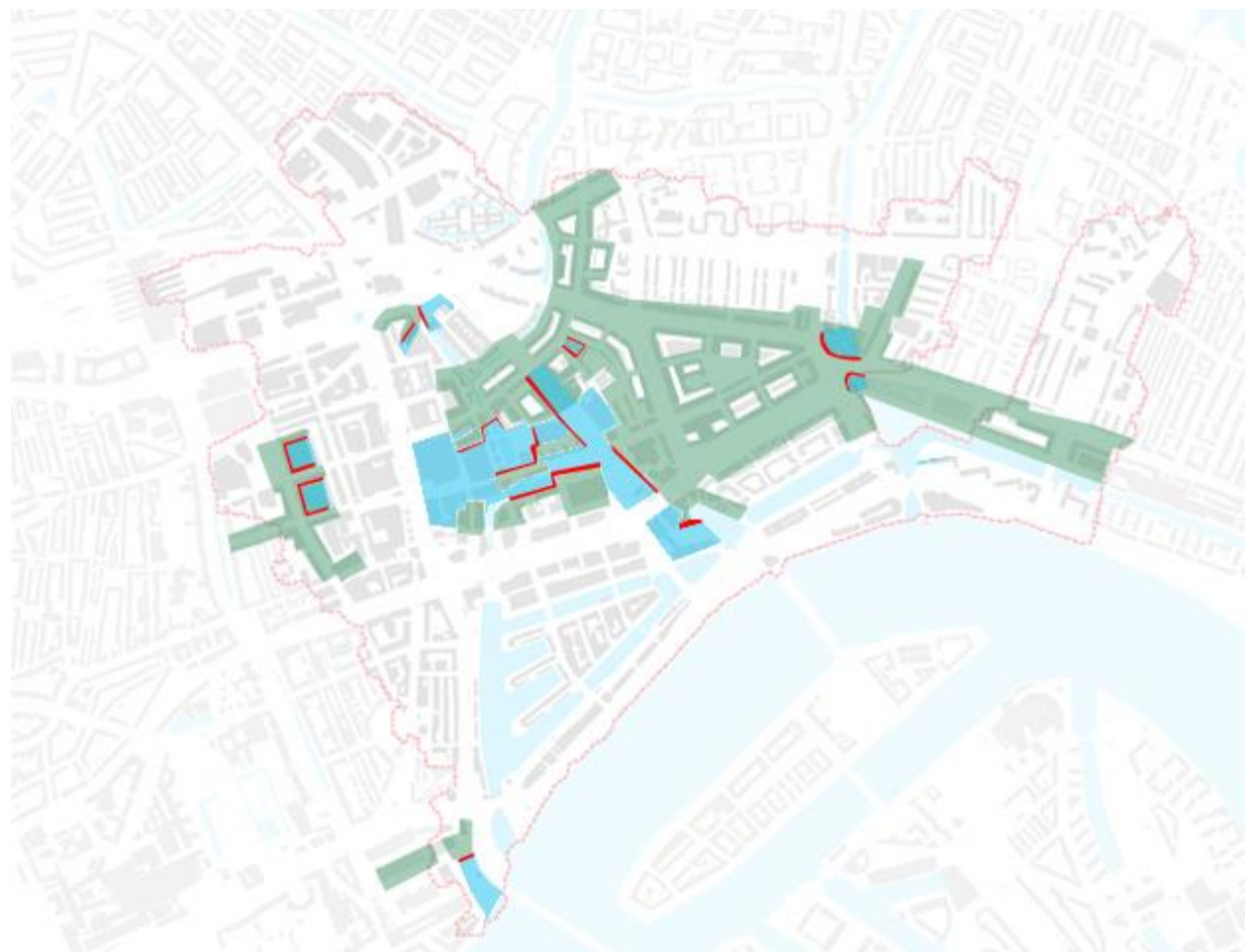


Figure 13 The borders between mix use and pedestrian accessibility (own ill.).

Public space characterized by elements within them

The elements in a public space influence how this space can be used. Sometimes these are facilitating use, acting as a separation (telling you not to do something) or solely ornamental. Just like Giambattista Nolli, I drew the infill of the public space. I did this by mapping the fixed elements within the public space other than buildings. Generally these infill elements do not form visual barriers like walls do, but rather suggest a certain behavior (please do not pass here – for your safety or for privacy) and invite (sitting on grass, benches and edges). I therefore refer to these fixed elements as soft barriers, directing elements, and facilitating objects. The elements distinguished in this section are: raised green, grass surfaces, trees, vertical barriers, steps, artworks and benches (also visible in the legend).

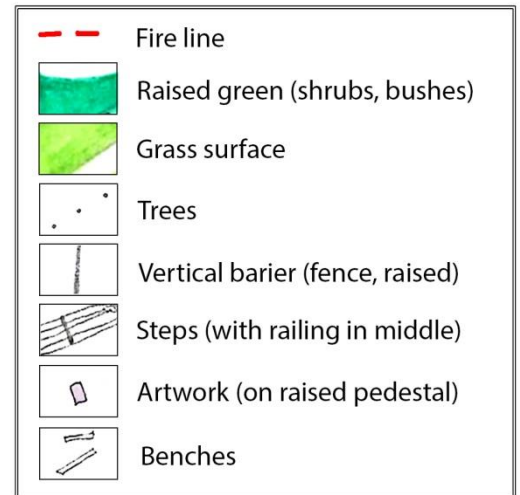


Figure 14 The infill – elements- in the public space (own ill.).

The use of these elements in the public space in Rotterdam (see detail of the map of fig. 14 in Appendix D):

- *Raised green* applied as separation (between traffic flows), visual element, and privacy creation (squares).
- *Grass surface* used as separation (between traffic flows), visual element, elements of use (the lawn in front of the market hall which has a slope used for sitting and artworks that are used as climbing racks by children and for dogs to run and defecate).
- *Trees* used as separation (to indicate walking routes, separate traffic), visual element.
- *Vertical barriers* are applied in the form of raised floors to direct the public (steps and slopes) and in the form of fences to protect the public (from falling down or meeting traffic).
- *Artworks* are placed mostly placed on points where pedestrian streams cross.
- *Benches* are spread around squares (in linear arrangements or randomly spread chairs), around centers of public interest (the main shopping street, the station).



Figure 15 Example of uses and arrangement of elements (own ill.). Right to left: raised green separation, protective fence and separating grass.

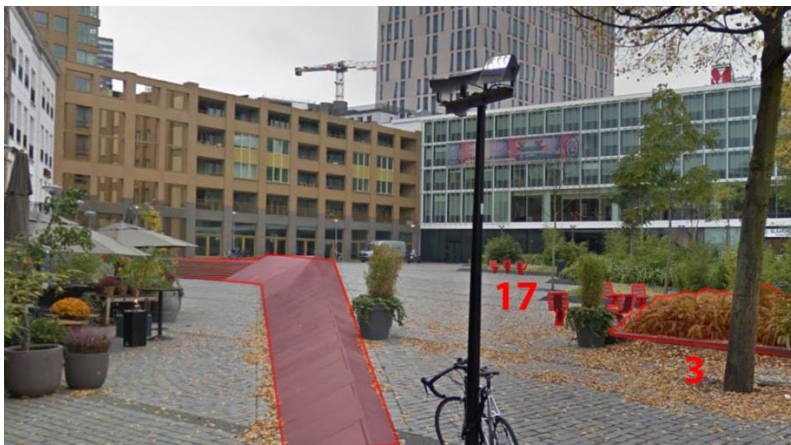


Figure 16 Example of uses and arrangement of elements (own ill.). Right to left: privatizing raised green patches, spread out seats and vertical barrier including steps to separate areas within the square. The steps has potential to become a place for people to socialize.

Overall, we can conclude that within the fire line there are only a few places where these elements form typical arrangements into the typologies of public space of the square (5x), the park (2x) and the playground (1x). Some of the places include the elements of these typologies, but because of their reduced scale and positioning towards traffic cannot be counted as those. These areas I suspect therefore will be used more as places of brief staying, than what can be expected from the traditional typologies of the square and park. Besides these arrangements and combinations of elements that shape clearly and less defined spaces however, most of the elements in public space are scattered and have only one function that is related to the one of the building that surrounds it. This corresponds with the notion of fragmentation that modern cities create. As improvement of the public space concerning the relations it can have with elements, it can be advised to create areas where these elements can be used, have a relation with each other and are located in a safe place (away from dangerous traffic flows). Green elements can have a special role in this, as there is almost no continuous piece of green that is big enough for recreation in this area of Rotterdam compared to the rest of the city (see fig.17).

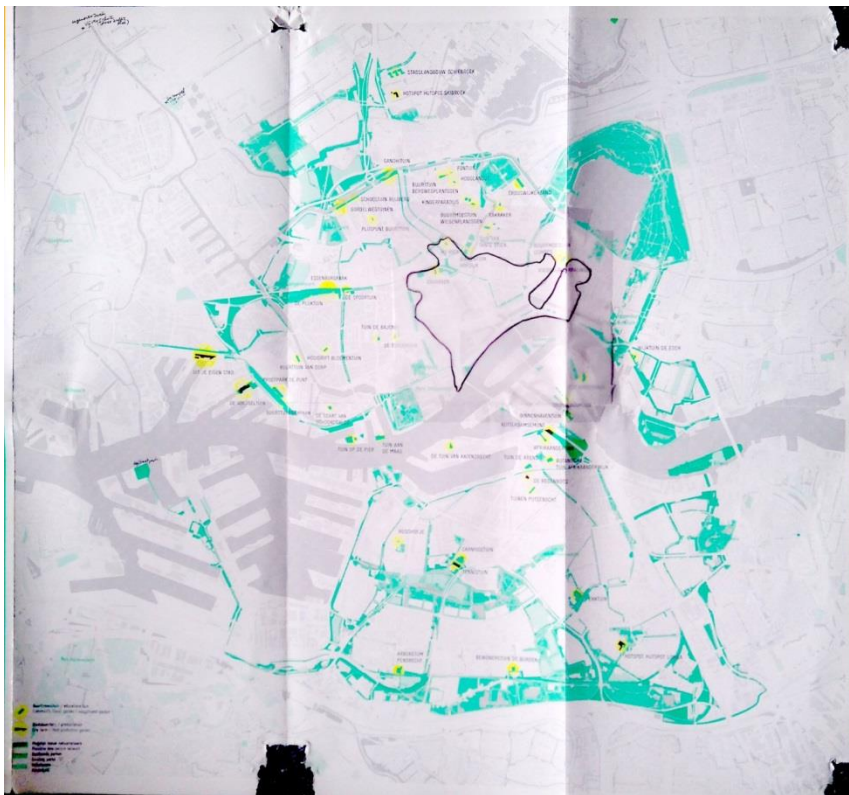


Figure 17 Green facilities in Rotterdam with the contour of the area within the fire line marked in black (Lola, 2015).

2.2.2 The empirical experience of public space

What types of memorable public experiences are occurring in the area?

This section of exploring how the public space in Rotterdam is functioning currently and what are the potentials and problems focused on how the space is experienced by the public. It is impossible to get a complete image as any sample will be a mere selection and non-all-inclusive. Knowing this however, just like Wentholt (Wentholt, 1968), does not mean an attempt to survey this topic is useless. It just means the intent and the value of the outcome needs to be considered thoroughly beforehand. Unlike Wentholt's general survey in 1968 and the one of 2015, for this question I would like to investigate what factors of experiencing have been important in the public experiences of individuals. At the same time, possibly an overlap of experiences could be observed in Rotterdam in its entirety or as occurring on specific locations within the area – designating areas that could use an improvement. The results are indications of the directions that can be of important for the total public (see the list of limitations in Appendix D3). As established in the theoretical and analytical sections, there are a few hypotheses about the possible effects of and solutions for problems of public life in the modern city center of Rotterdam. These will form the basis in which to reflect on the results. The following sub questions will be addressed:

- What are the types of presence in public space? What forms of actions, perceptions and reactions take place in the public space?
- How do these types of public presence relate to 1) the other people 2) other aspects of the environment?
- How does the public value these experiences? What do these values depend on?
- How do these experiences relate to the locations in the city? Are there areas of common types of experiences? Are there areas without experiences?

As these questions seek to develop a deeper understanding of human perspectives, the methodology that will be used in this section can be described in the vocabulary of qualitative research. As the questions that I seek to answer are broad and open in nature and answers will be varying from person to person, I employed personal interviews with a limited sample of 17 people that had mixed characteristics (varying in age, cultural background, education/occupation, gender, visitor/inhabitant, living inside the area/outside). More information on the sample composition and selection can be found in Appendix E1. To cover all the aspects of the questions above while enabling the interviewee to discover what her specific values and unique encounters, an open question had to be created that could start the dialogue on his/her experience:

What are your memories/experiences in this place²²?

²² There are several ways to refer to a place: actual presence in a place, using a photograph and referring to it by abstraction (names/words or maps). Since this question among others seeks to understand the way that spaces are perceived and what is essential in this perception as well as to uncover the element of time within this (experiences throughout the lives of the interviewee), I do not want to influence their perception by anything that

To connect the experiences to their respective locations, questions were linked to a map and answers noted on this. By the same logic of reducing the impact of detailed predefined interview questions to answer the main question in this section, the existing imagery was reduced to zero on this map. A tabula rasa of the public space for the memory to project its experiences on was produced (an A0 Nolli map of the modern area of Rotterdam with its direct surroundings, covered by a transparent sheet). The main question would be directed towards the white space then, which corresponds with the public space. Either the interviewee or the interviewer (or both) would note (in drawing or text) the experience the interviewee remembers. The interviews would take place on a location and time that suited the interviewee (a detailed account of the setup of the interviews can be found in Appendix E2). See also the limitations of this interview methodology in Appendix E3.

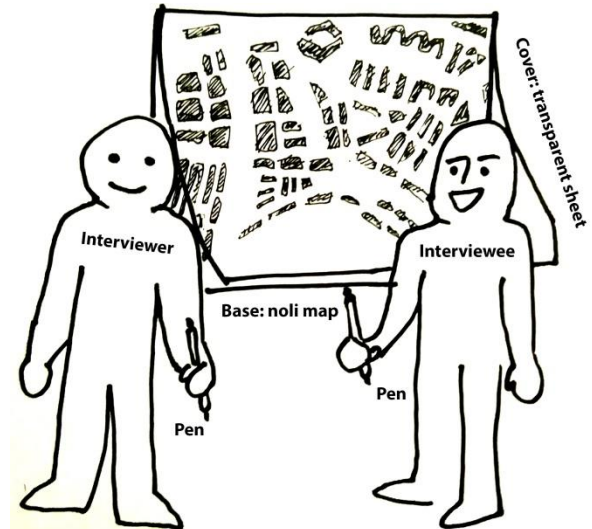


Figure 18 General setup of the interviews (own ill.).

The interview questions came in three categories and followed the subsequent order:

Contextual Questions	<ul style="list-style-type: none"> • What is your age? • (Since) when and with what intention you are living in/visiting Rotterdam? • Where do you live? • Where do you work?
Primary Question	<ul style="list-style-type: none"> • What are your experiences in the public space on this map (marked in white)? • What are your memories in this space?
Prompting Question	<ul style="list-style-type: none"> • (Specifying) Why was this a memorable experience? What was specific about this experience? When was this? Was this with other people? • (Missing) Do you have any experiences/memories of animals/nature/objects [one that interviewee didn't talk about]? <p style="margin-left: 20px;">Do you remember anything in this [place that interviewee didn't talk about]?</p>

Preceding the primary question were some contextual questions to determine the perspective of the experiences that were being talked about. Upon people's answers to the main question, sometimes an explanation was asked (to get the elements of the experience more specific). By the end of the interview

represents the space in a set physical and time frame. Therefore, I chose to refer to the places by abstraction, using the Nolli map presented in the earlier section of this research.

finally, a few questions about elements, perspectives and places that were not mentioned by the interviewee himself/herself. Any conclusions on the way people perceived places were noted extra on the side of the sheet; often people concluded their relation towards the city themselves during and by the end of the interview.

The data of the explorative in-depth interviews was then analyzed by merging the answers in one 2.3 by 2.8 m drawing to see overlap in experiences (see for similarities of this product with the field of Psycho-Geography Appendix E4) and in an abstracted drawing with categories to ease this work.

Results

1) Types of presence in public space

What are the types of presence in public space?

A written description of the work of the artist Jan Rothuizen (discover his work and methodology in appendix D4), inspired me to use the following categorization for the experiences narrated: seeing, doing, feeling and thinking (see description including examples in Appendix D5). The narrated experiences and memories were all ruled by these certain human actions. One could say these actions confirm the presence of the person on the location. In this way, they are types of awareness or presence in the public space.



Seeing

The relation described in these kinds of experiences, is a passive and receiving connection with the surrounding, like:

- Seeing or sensing (elements of) an object/person/animal/nature/place
- Recognizing a place (by name or by physical attributes),
- Remembering things that attracting attention
- Elements of orientation

Example of used phrases:

“Here is X(object, location) – [not followed by an activity].”



Doing

The relation described in these kinds of experiences, is characterized by an engagement with the environment through action. It involves doing something habitually, repetitively or incidentally on a location. A division is made between:

- Acting as an individual
- Acting with a group that has communal grounds (e.g. friends, family)
- Acting or encounter with or within (a group of) people that are unknown to interviewee (parochial realms and strangers).



Feeling

The relation described in these kinds of experiences, is characterized by instinctive emotional reactions and deliberated judgements/opinions related to sensual experiences. They include opinions and feelings:

- Positive opinions and feelings
- Negative opinions and feelings



Thinking

The relation in these kinds of experiences, is one that describes a non-existing (future, past or imaginary) reality triggered by the observed environment. It is again a reaction of the brain to the environment, but this time not characterized by judgement or feelings, but by imagination. It includes:

- Associations
- Ideas (including suggested improvements)

Examples of used phrases:

“Looks like/ makes me think of ...”

“I call this ...”

“I always thought ...”

“This could be ...”

Hannah Arendt described the public realm as a social one defined by our actions towards other people in space. George Baird argued the distance we have towards the other decides in what kind of social connection we engage. The closer the distance the more the chances we become aware what the other is and what we are ourselves. All of this happens in a state of distraction according to Walter Benjamin. It is in this state of distraction that we are able to step out of our own image. But that doesn't mean there do not exist public experiences in some sort of concentration. One of which Sennet puts forth as public places that create submissive mass behavior (synchronic spaces).

However, in the interviews action towards others appeared not as the only value of public spaces. The occurrence of accounts of individual discoveries and actions not (consciously) related to other people, showed this is just as much a value of public space as the social one. One of the examples of this is laser beaming the Erasmusbridge (see Appendix D5, *Seeing -Private acts in relation with the surrounding image 3*). In this regard, the theory of Arendt does not suffice for describing public space. To refine our definition of public space, it can be defined as a place of presence of all otherness (animate or inanimate).

Looking at only the social aspect of the experiences that people had in public space, the division between the realms of otherness established earlier, are a useful instrument to categorize behavior. In the category that relates to the realm of action mostly – doing- I made the distinction between individual action towards known people (community), and towards strangers (parochial realms and strangers). As stressed in that chapter the specific condition of cities is the presence of strangers. Looking at the occurrence of accounts relating to strangers, there are different actions and connections made to them: by looking at and observing them (examples see Appendix E5, *Seeing - Seeing the other and the other's life*), and by interaction (for example exchange services, confrontations, performing, parade - see Appendix E5 *Doing*).

The notion that we perceive public space in a state of distraction could not be completely verified in this research as the narrated reality might be limited compared to the real experience they remember. Though, it does seem often distraction was happening, considering memories all convey a focus on a certain aspect of the environment. The distraction in this then lies in our own focus and actions in space (seeing, doing, feeling and thinking), rather than something that is outside of us. Moreover, all these memories can also be interpreted as a state of focus and careful examination.

Overall, we can see there are different ways of engaging with the public environment, of which not one is more meaningful or useful than the other. Moreover, it is often a layered engagement consisting of action sequences or happening simultaneously. Acting (doing), perceiving (seeing) and reacting (feeling, thinking and doing) are in a constant exchange and in a continuous flow.

2) Relations towards the environment

How do these types of public presence relate to 1) the other people 2) other aspects of the environment?

Are these complying with the division assumed? Levels of connection.

As explained in their description, these categories all have different ways in which they connect to the environment. A more detailed analysis of these categories will examine, the relationships with the environment, in other words 'the other', that are expressed within these human acts. To establish the different relations existing towards the environment, I used the following question:

*What is the most essential in this memory*²³? What acts of perceiving - which form the relation to the places, activities, objects and people within the public locations - are at the core or them?

SEEING

'Seeing' should not be understood only as perception through the eyes, but in the broader sense of 'experiencing', the way the surrounding gets perceived, 'enters' the human. This action appeared to take place in the interviews relating through (see description with examples in Appendix E5):

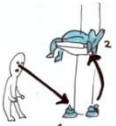


1. Icons of *recognition*.
Served as orientation objects, shared communication, or passive memory.

2. Objects and scenes *intended to be seen*.
Have a remarkable position and appearance, but cannot be related to beyond perceiving them.



3. Remarkable *details*.
Triggering elements cause the observing and examining of aspects and properties of objects and spaces.



4. The other and the *other's life*.
Indirect or direct observation of other living beings. Sometimes takes the form of tracing or stalking. Often broadens the reality of the observer.



5. Experiencing through *forces*.
Abstract or things not directly visible are perceived through the effects they have on other elements in the surrounding. Effects of these observations often have influence on mood.

This order reflects on the state of presence: from a more passive attention, to a more detailed focus of attention towards the environment. While the first two could be considered a somewhat passive reception of the environment, 3-5 show concentrated observation sometimes combined with examining and deductive activities. The last three seem to contest also with the idea of distracted experience of Benjamin.

²³ As becomes prominent in this question, the assumption is that whatever is narrated in this method of using the memory of the interviewees to the maximum, are only the things that stand out from the whole setting of the experience. In this way, the ways of perceiving can be understood.

The reason why a concentrated mode of perception comes about and what makes us examine or deduct can only be guessed. In accordance with the commencement of play (see next chapter), this might be explained by the observed being in contrast towards its environment. As noted in the analysis of elements, attention can also be directed if the element is the only thing in the environment.

Looking at the social aspect of seeing, the observation of the other and the other's life is the first step towards the other. This can amount to a more engaged relation if the other becomes aware of the observation and people start to engage in action with each other. On itself already though, observations of others seem already valuable for the expansion of the reality of the observer. An example of this is one interviewee remembered observing blind people doing crafts on the roof opposite the balcony of her grandmother's apartment as a small child (fig. 19). Most likely this was a fascinating scene for

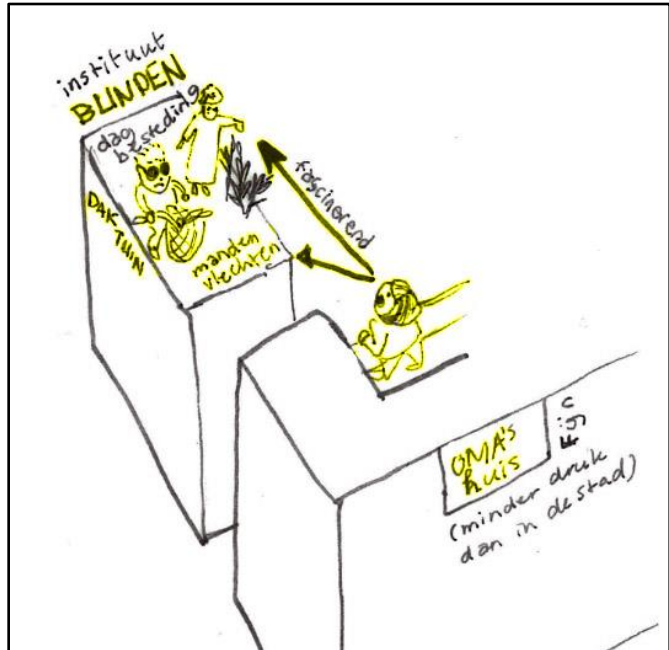


Figure 19 Expanding reality of interviewee through observing others and their lives (own illustration based on interview story).

the interviewee to remember as she had never seen such people before and through the activities and behaviors of the observed got an empathic understanding of what living would be like for blind people.

Experiences triggered by forces often hold an exceptional status in the memories narrated. Often these accounts were accompanied by a certain mood and appreciation of a place. The forces that make the observer aware of a reality unseen, combined with other characteristics of the moment, can be much effective to linking this force to the given emotion. An example is the sound of trembling leaves that caused the observer to notice the poplar's presence. This experience of the poplar tree's sound accompanied by the setting of playing games with her sister outside on long sunny afternoons within the narrow and empty 'backyard' of their social housing complex, caused the interviewee to perceive the sound of a poplar tree whenever she hears it as a safe, carefree and friendly sound. Compared to the other modes of seeing, this way of perceiving the environment is

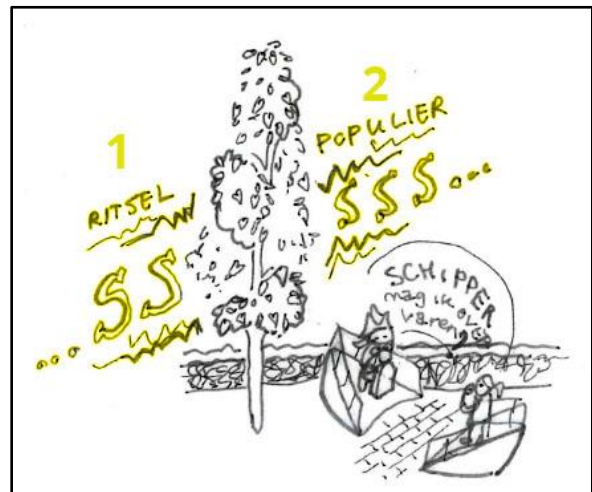


Figure 20 Experiencing ambiance through an interplay of observed forces (own illustration according to interview story).

attentive and much more active: it is not the somewhat following of the moving elements (like other's life), but active tracing enforced through thinking. The cause it can have on the perceiver and the value it has is very personal but strong. These kinds of experiences can be described as experiencing 'atmospheres' (see Appendix E5 *Seeing-Experiences through forces*) or 'ambiences' as Böhme calls it (2001). Bohme, talking about ambiances confirms this relation stating it is not a relation between object and subject, but something in-between:

"... ambiances are neither conditions of the subject nor characteristics of the object. Still, however, they are the only experienced in the actual perception of a subject and are co-constituted in their being, their character, through the subjectivity of the perceiver. And even though they are not characteristics of the objects, they are obviously produced through the characteristics and interplay of objects. That is, ambiances are something between subject and object. They are not something relational, they are the relation itself" (Böhme, 2001).

Often the interviewees described the places in this category with adjectives that they could not elaborate much further on. General terms like "gezellig", "mooi" or "apart" were used in combination with one element which presumably partially caused the interviewee to experience this place like that. In these places under certain circumstances, an atmosphere of coherence of different elements is created (see elaboration in Appendix D5, *Seeing-Experiences through forces*). When the different interview results were put together on locations, the interviewees together sometimes managed to create an image of this unity and the elements that created such moods in areas (see fig. 21). This suggests it is possible to create such experiences consciously through designing with the use of forces.

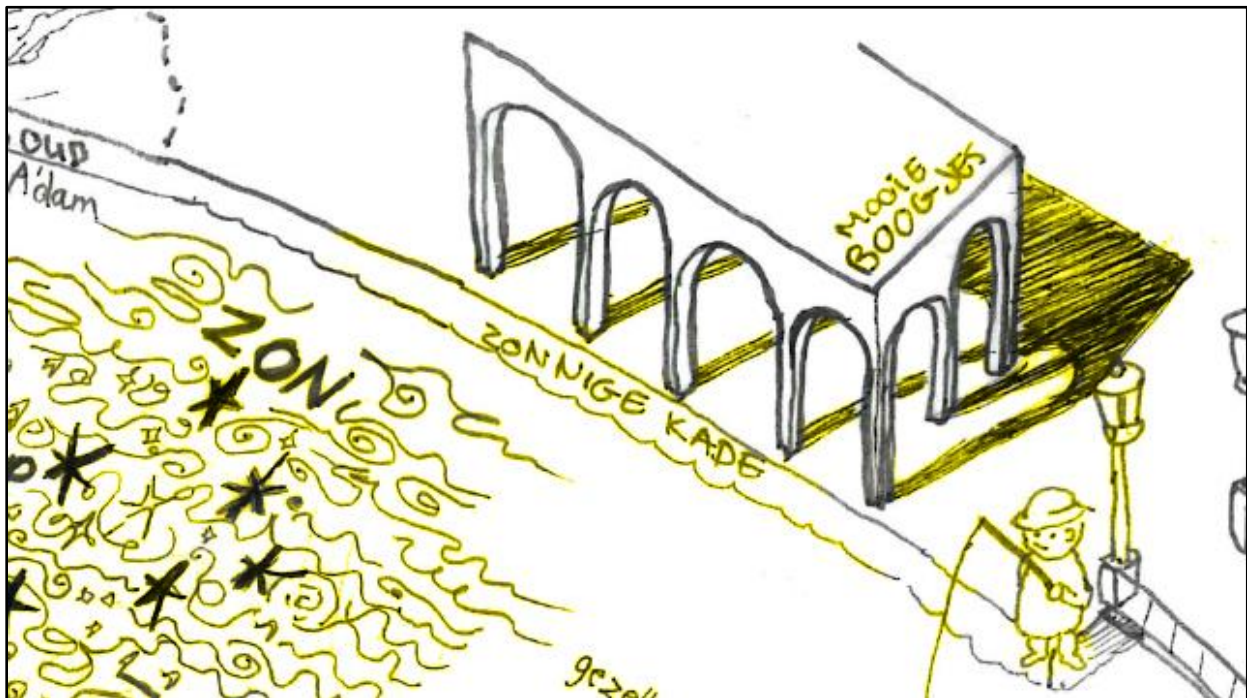


Figure 21 Experiencing atmospheres of coherence through interplay of different elements on a location at a specific time (as narrated by different interviewees: sun reflection on water, shades of arches and the fisherman on the corner) (own ill.).

Reflecting on ways of Seeing

On the process of perceiving, there are a few notions that became apparent. Most of these deal with the limits and conditions of human perception and are therefore a valuable insight especially for designing space. Firstly, following the conclusions of James Gibson about visual perception, perception happens in locomotion: we perceive and understand our environment through passage in time, and through appearing, disappearing and reappearing (Gibson, 1986). This process can be either generated from within the perceiver (locomotion) or can be attributed to a moving environment itself. The first becomes apparent in the way we observe remarkable details in static objects, the second for instance in the observation of moving scenes (the other's life and experiencing through forces). Secondly, human perception is limited to the array in reach of our senses. For vision the conditions for understanding our environment are aptly described again by James Gibson. He implies we perceive in an ambient array with occluding edges and that it is precisely because of this occlusion and our motion, that we can make sense of what we see (Gibson, 1986). In this he opposes the previously assigned importance to memory in the creation of experiences, stating real-life experiences (unlike motion pictures) are not a succession of multiple instances that we recreate as a scene in our mind to understand what it is what we see. By this statement, he obtains a vision of an ecological perception: a more holistic (non reductional), relational view of surroundings. Finally, as suggested in the previous points already: we can only see one scene at a time. This becomes apparent in the memories of ambiances in 5, in the way interviewers separately were not able to specify all the elements that created an ambience, but when different interviews were put together, an image was shaped of the different elements that could contribute to this mood. This suggests that due to our limitation of focus combined with the many surrounding elements in cities, we might often be in the state that Walter Benjamin described as "distracted". However, 3-5 suggest this is not so much a state of distraction, rather a state of attention which is either directed to something intentionally or lead by the surrounding itself. It might direct more to a hypothesis that we perceive in sequences (sensual routes) of details, which shape our whole knowledge about how things are.

The process of perceiving already made some things clear on how we make sense of things we see: through motion, through what is visible and not visible in our array, through a route of focus that can constitute a holistic understanding of the seen. Then the second question related to perception becomes interesting: how do we attribute meaning to the things that we see. It is Teake de Jong that bridges these abstract notions of how we perceive and translated what we perceive into the knowledge that these experiences produce in his theory of awareness of scales (2010). In this theory, De Jong describes how 'frame' of either imaginable horizons or perceptible horizons and 'grain' of detail that can be observed as an "undetermined inner environment of the object", may change (according to the scale of observation depending on age of perceiver or the movement during the day of adults) and influence our perceptions of the environment. He links this 'resolution' of our environment to the awareness and learning we get from the perceived environment (fig. 22 and 23):



Figure 22 Hypothetical nominal scales of awareness by age (De Jong, 2010).

	years old	0	1	3	5	7	9	11	13	
m Radius of frame		1	3	10	30	100	300	1000	3000	learning
differences to experience:										
hard-soft		x								danger
movable non-movable		x								operational abilities
color		x								recognition
windows doors			x							orientation
light dark			x							imagination
shelter corners			x							to escape adult movements
function time			x							every time having its own place
visibility			x							hide-and-seek
accessibility				x						rules
control				x						other people
noise				x						context
temperature				x						kinds of clothes
wetness					x					hygiene
ceiling shelter					x					in-betweens to hesitate, to decide
plantation					x					living nature
sun					x					physical nature
formal-informal					x					different behavior
recognition surprise					x					initiative
run compete						x				ambition
watch, learn						x				to learn
possibility to buy							x			expensiveness
possibility to walk							x			interest
possibility to ride a bike							x			ride
urban functions								x		exploration
meet retire									x	projection identification
atmospheres cultures									x	identity

Figure 23 Legends for design (De Jong, 2010).

De Jong acknowledges that it is because of differentiation missing on these scales in urban environments, that environments are being perceived as boring; not all learning is represented in the fabric of the city.

The scale sensitivity of perception is also apparent in the memories of the interviews: from recognition to experiencing atmospheres, the perceiver is more aware of the environment.

Throughout this subdivision of seeing, another line of how we constitute meaning can be drawn: according to the conventions, intentions or surprise. This relates to the uncertainties and unknown of

the city. Conventions are known (icons of recognition) and are used for orientation on a personal level or as communication on a shared level. The latter of these can thus be conceived as a shared knowledge and sometimes even a public knowledge. Other shared known experiences are those of scenes intended to be seen, as these are often elements of static objects in space that like icons of recognition are prominently placed, however not everyone might pay equal attention to them. Once the attention is directed in the active mode of observation, remarkable details are observed, lives are traced and the relations between the elements of the environment perceived. It is then that a scene achieves personal significance, as expressed in the definition of the verb 'to observe': "*Notice or perceive (something) and register it as being significant.*" (Oxford, 2016) Although all perceptions are triggered and take place in the environment that surrounds the perceiver, it is observation that can range from intentional focus to being led by the environment in case of experiencing ambience.

Therefore, we can conclude that the way we perceive (motion, occlusion, routes in time) as well as the conditions of our environment (scale) combined of course with our personal state of mind, influence what we perceive (abstract notions, a track of details or a multifaceted environment of ambience) and how we do this (according to conventions, intentions or as a surprise). These experiences generate a different relation to our environment and can be categorized as having a different level of public awareness (from conventional to surprise, they go from the known to the unknown), and different levels of active role in this as a perceiver (from common knowledge to an active state of precise observation or attentive awareness).

If we relate these conclusions about seeing to the construct of a social sustainable and compelling public environment which allows for constant discovery, it becomes clear that attention must be raised and sustained in such a place. As suggested in this section, this can be achieved by the categories that have an active state of perception: remarkable details, others' life, and forces. Relating this to the newness factor of play (see next chapter about play) and human preference for the perception of motion and change, we can conclude that in such an environment a static relation is less apt. To describe dynamic relations I would like to introduce another division of the things that were seen in the interviews: we can look at ways of seeing revolving around either **objects** (a "material thing that can be seen and touched") or **instances** (an "occasion of something happening"). Relations to objects might be limited to create an infinite playful experience unless it's a material that is easily changed in seasons or through other (human) interventions. Relations to instances, especially unexpected ones, can enhance the play environment since they are finite in time. The other ways of seeing have their own important public role: recognition can become important for orientation and communication, possibly valuable for the entrée of a public space (a visual or suggestive entrée in a not so busy area is desired to create the peace needed to discover the otherness).

DOING

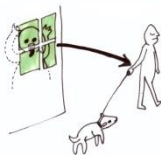
After exploring the ways of public perception in the interviews, now I'll go into detail on the actions that became apparent. As mentioned before, I make a basic distinction between doing something 1) alone, 2) with someone known or 3) next to/opposed to strangers. This section is important then to establish the state of the traditional public nature of the public spaces: the active connection that we have with strangers. The balance between social actions and personal experiences can be weighted by their occurrence. Also, the reoccurring appearances of actions on certain places could indicate the value of these places mostly comprising one use.

Different relations with the environment defined by actions, ordered from less to more connected to the environment (from private to public) – examples in Appendix D5:



1. **Private** acts

Using facilities by yourself that happen to be in the center of Rotterdam in private areas.



2. **Private** acts in relation with the **surrounding**

Acting towards public space from within the private environment. Often only one sided activity (watching, projecting).



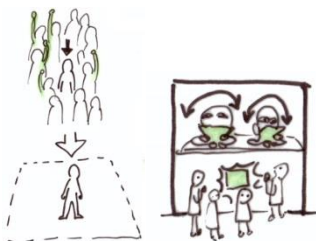
3. **Social** centers of **consumption**

Were named frequently. Interaction with others is often introspective - restricted towards the company that you are with, and the activity (shopping, eating) that you are doing. Relations directed outwards the centers often only allow for visual connections. For some it is a comfortable way of meeting new people.



4. **Social** centers of **cultural institutions** and centers of **leisure**

Depending on the activity there is more possibility to connect to strangers. The setting of parochial realms. Common interest and activity creates reason to talk with strangers.



5. **Areas** of **public** space

Big open space as scene of events and otherwise perceived as cold. Smaller open spaces as scenes of smaller more social events and when containing use elements also of daily encounters and uses. Linear busy street structures with little use elements as scenes to perform. Inside public space as centers of presentation and concentration.



6. Public in-between space (roads)

Habitual (pragmatic or drifting) routes, exceptional vehicle used, exceptional encounters (made the interviewee stop on their way) and private freedom.

Though I assumed centers of consumption to be less public, one of the interviewees mentioned however, that for her shops are valuable sources of social contact with strangers. She would regularly start a conversation in shops, as the wearing of clothes in a shop gives rise to the opportunity to compliment someone quite easily. Also, she mentioned casual conversations with staff of frequented shops and cafes, although it was admitted that in the city center these days the staff often tends to forget who you are. In this sense shops can be interpreted as a social realm of parochial others in which the sharing of interest (of the shop's content), is a reason to start conversing with strangers. As such it seems that knowing that you share something (knowledge, preference, shared observation, shared suffering) causes people to talk to each other.

The roads were often the scenes of Benjamin's distraction and exceptional encounters with others. Roads also appear to be the scene of very private acts. In these acts the intent or effect of these acts was purely directed towards the individual that experienced it, seemingly uncensored or unaware by an awareness that one can be perceived by the other and that their acts might be unfavorable for or affecting their 'public image'. This can be expressed as a feeling of confidence or freedom that can exist in public spaces²⁴.

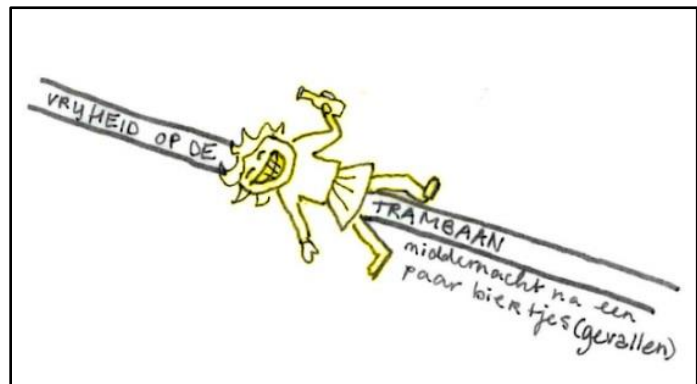


Figure 24 Freedom in the public space (own illustration according to interview story).

Reflecting on DOING

There is a myriad of activities that the city center of Rotterdam seems to be interesting and valuable for. These range from the private realm; the semi-public realm; to the public realm. Compared to other categories of experiences, it is this realm of action that provides for the social public experience. As we have seen in the previous section on seeing, scale was an important parameter for the way we perceive things as well as attribute meaning to them. Action can also be related to a measurable unit. Baird introduces the parameter of publicness "propinquity": the distances that bodies have towards each other in space (Baird, 2011). He relates distances that exist in certain public spaces to the way people

²⁴ Either supported by an inwards confidence or oblivion, or reinforced by the 'urban etiquette' of not bothering and/or the reassurance that there is a small chance you'll meet these people ever again.

behave towards the other, the 'social codes' of the city²⁵. Looking back at all the activities of doing, we can indeed see there is a relation of the types of social connections that are established and the spaces that these acts appear. Smaller spaces, like the places by the roads, often generated direct confrontation or interaction with the other, whereas intermediate spaces (networks or designed squares) allowed mostly only for the 'watching' of the other. Big open spaces on their turn were often used for events. These attracted big crowds, which assume the necessary raised acceptance of the individuals to others close by.

Besides propinquity, Baird describes visibility²⁶ of the others and continuity²⁷ of spaces as fundamental for the publicness of spaces. He stresses the public importance of a continuing movement as this allows for drift, which relates to his thesis that a state of distraction allows for public action. Although I do not see this continuity or the state of distraction as a deciding factor for publicness²⁸, the interviews did show that movement can be important generators of experiences (both by perceiving movement and by being in movement). Also it is indeed those areas that allow for a continuous movement and those designed for a moving public that were the scene of many different public experiences with a diverse composition of public (see Appendix E5, *Doing - public areas*).

I conclude this section with stating the importance of all the private, social and public acts and perceptions of the city. All of these have their specific place in the public space of and cannot be recreated in the domestic private realm. Considering this in an improvement of public space in the city, would mean to allow for the diverse range of uses, both more public and private ones. Directions on how to achieve this is to provide for a continuity of movement and diverse scene of presence of the other both in static state and in motion. The good examples are located in areas of public interest and have multi-directional orientations, which allow them to be 'synchronic'²⁹. These provide for a continuity and diverse scene of presence of the other both in static state and in motion. To encourage encounter, interaction and confidence for private acts in public however, narrow areas that often suggest motion appear more suited. It is a certain density of people that allows for publicness and privateness in public. Designing for a diversity of this density allows for the joys, fears and wonders of the unpredictable nature of publicness to be experienced³⁰.

FEELING

²⁵ Close to each other in rush-hours of public transport and while dancing – generates an acceptance and non-violent mode towards the other; intermediate distances when there are less people (as I already distinguished 'the urban social etiquette'); remote distances for performance – ultimate limit to understanding the seeing and hearing of the other) (Baird, 2011).

²⁶ Without perceiving the other interacting cannot take place.


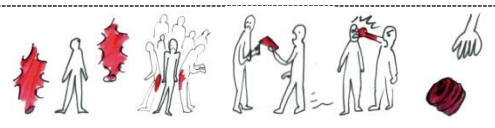
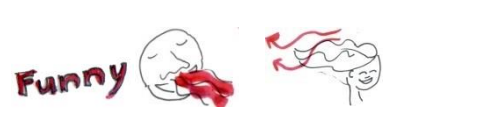

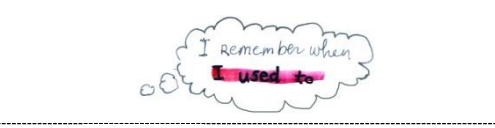

²⁷ These are spaces that allow for un-programmed, unhindered, undirected public movement.

²⁸ For instance we have seen that it also in confrontation or stops that publicness occurs and that public space is often the scene of directed attention.

²⁹ Some spaces that allowed for multiple forms of public experiences and private ones, were the inside library, the network of streets in front of the shops and the smaller open designed spaces.

³⁰ Joys: providing for something you cannot have or do privately, meeting and being around many people. Fears: uncertainty of actions of the other like collisions, unpleasant behavior of quarrels and thrown tomatoes. Wonders: surprising atmospheres and characters met.

I will elaborate on the mental reactions that some of these experiences and situations are accompanied with, governed by and expressed in. This section deals with those reactions expressed in emotion or judgement. In these memories of experiences the *feeling* they was the main cause for remembering. These memories related either to other people, spaces or elements of spaces or personal events. Often elements that were conceived as negative by someone on a specific place were either conceived as positive by the same person on other places or by another person (seen examples Appendix E5, *Feeling*).

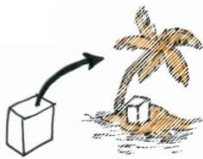
	<p>Emotional relations to other people</p> <p>'gezellige' crowd, being in good company, seeing good human deeds</p>
	<p>absence of people, suffocating crowd, undesired behavior, seeing bad human deeds</p>
<p>Funny</p> 	<p>Emotional relations to spaces and elements in these</p> <p>beautiful area, funny element, nice breeze</p>
	<p>empty area, cold old element, too windy</p>
	<p>Personal events</p> <p>nostalgia</p>
	<p>accidents, painful events, exclusion</p>

What we learn from the judgement and sentimental perception of people and spaces, is a diverse relation towards people: we often enjoy doing things together, even the sheer presence of many different others in a place (without connecting to them necessarily) is often enjoyed by us and the absence of people and their activities in the city is perceived as something bad as well. The opposite sentiment of all of these exists as well when it involves the objectives of others in a crowd not matching the own one, or others that show bad behavior. Our emotions are also governed by our perception of and experiences in spaces. We have seen the joy of beauty, association and surprise as well as their opposites (ugliness, negative associations and boredom). Also the opposing emotions connected to different aspects of an environment (smell, surface, wind, colour, temperature, sight and sound). Thirdly our emotions are influenced by personal events: things that happen to us (accidents, being in love) and things that we used to do (looking back with nostalgia).

As opinions and events are scattered about many areas (not clear shared opinions), before quantitative research with a sophisticated evaluation system has been done, nothing valuable can be done with this category.

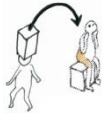
THINKING

The interview responses governed by thinking included associations and ideas (including suggested improvements) and related to something not currently present at that place. The connections were either made to the past, to an alternative present, to a future or to an alternative reality that cannot become real (fantasy). The subjects of these alternative connections related to uses, forms, people, events and names (see examples Appendix E5, *Thinking*).



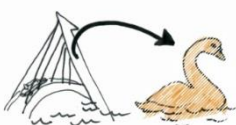
Association with a different place

Similar atmosphere, event on location refers to similar events or related events elsewhere, place represents a whole area with different stories.



Association with different use

Referring to past use, shape generates ideas for alternative use.



Association with form

Shape resembles something imaginary. Famous are the names inhabitants create for iconic constructions.



Association with people

Elements resembling people, imagining people's life by their objects.



Association with events

Place referring to dramatic historic event, event referring to idea.



Association with names

Name resembles name of someone known, reconstruction past from ontology.

Reflecting on THINKING

The category of thinking represents different ways in which elements of a place provoke the imagination and links the observer to another, non-present reality. To a past were referring experiences of nostalgia and a remarkable past in appearance or use. To the present were referring alternative uses, atmospheric resemblance, physical resemblance and ideas of a bigger present in other places, representing stories in areas. To the future was referred to in non-executed plans and the potential future of executable ideas. Finally fantasies were associations that could never be or become real.

To uncover the mechanics of these ways of thinking and their relations, we can use the division of future thinking from De Jong (1992). A diagram inspired by De Jong's thesis in fig. 25 shows all the imaginable

futures categorized in impossibility, possibility, probability and actuality and divides them into their desired and undesired sides. As the imaginations in the interviews did not limit themselves to a future only, the scheme needs to be adapted by incorporating past and other places. Also the division of desirability does not seem to be of importance for the whole range of imaginative experiences. A broader understanding of imagination and how it operates in combination with our perception of reality needs to be established.

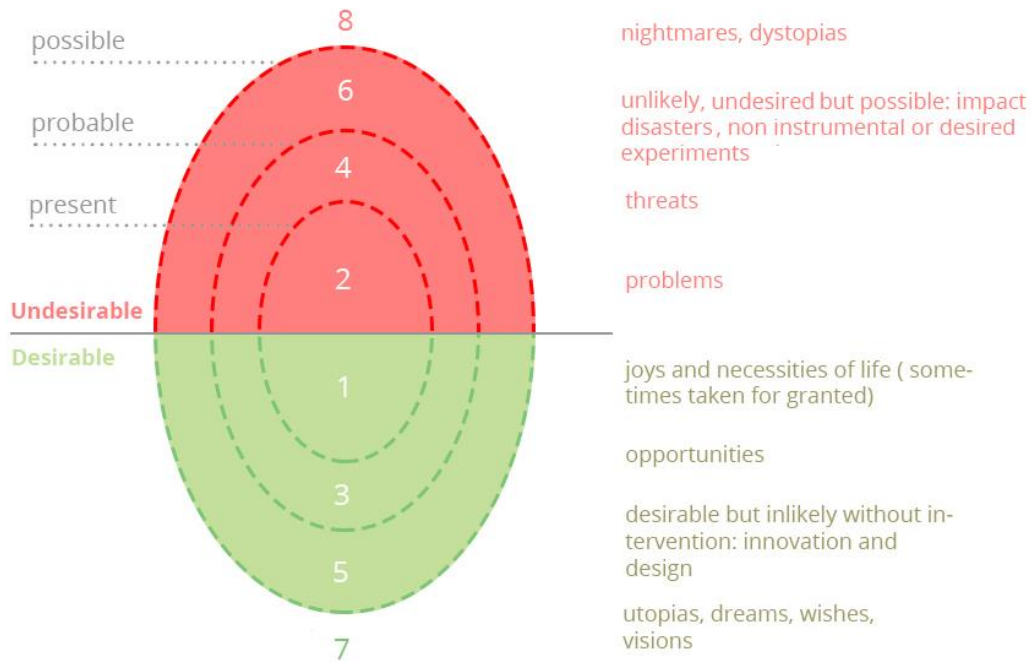


Figure 25 Realities as humans conceive them, separated by desirability and likeliness to become reality (own illustration based on (Van der Berg & Ganzevoort, 2014)).

In this respect, Gibson explains the types³¹ of non-perceptual awareness as such:

“A perceptual system that has become sensitized to certain invariants and can extract them from the stimulus flux can also operate without the constraints of the stimulus flux. Information becomes further detached from stimulation. The adjustment loops for looking around, looking at, scanning and focusing are then inoperative. The visual system visualizes. But this is still an activity of the system, not an appearance in the theatre of consciousness.” (Gibson, 1986)

Winnicott suggest the start of this ability to imagine things not present lies in the first play experiences of the child with ‘transitional objects’ where they explore the limits of control and separation of an inner and an outer reality (2005). As children have come to the awareness that they are not one with their

³¹ Gibson distinguished three types of non-perceptual awareness: remembering disappeared surfaces and events, plans or ideas (visualizing what could appear within the limits of possibility), dreams (outside the limits of possibility).

primary caregiver, these objects become the projection of their desires and worlds and are ultimately under their own control. These are primary practices of imagination, that construct the awareness of the self and the other and both their active forces. Imagination then, according to Winnicott, primarily suggests *“keeping inner and outer reality separate yet interrelated”*. In accordance with Winnicott, Salisbury expresses imagination as *“a space and time in which we can play with a world that yields to us and takes our impression, but that maintains enough of its own plastic quality to retain its particular shape”* (Salisbury, 2014).

A more extended view of this imagination in relation to the expressions³² of these is explained in more detail by Folkmann (Folkmann, 2013). In expressed imagination he explains, there is a sequence where the perceived reality is first internalized (transformed into an inner own reality) then externalized (in an expression). The process of internalization, the part which we can call imagination, can be expressed as a *“conscious adjustment of the new and the old”* (Dewey, 2005), in which *‘the unknown and unfamiliar become natural and familiar’* (Folkmann, 2013). New meanings can be created in this process.

To explain the imaginary realities that occurred in the interviews now we can construct our own model. Firstly the internalization process of the presented reality, which in opposition to the other realities I will refer to as ‘actuality’:

The origin of the imagination is rooted in an image the interviewee creates of a place within the tabula rasa of the nolle map. This actuality that is being perceived is a reality outside of the persona of the perceiver (similar to Winnicott, Salisbury, Dewey, Folkmann and Gibson). As such it corresponds with the local actuality of a place and represents the unknown world (see fig. 26).

Some elements within this actuality (ambiances, uses, forms, people, events and names) trigger associations towards different realities that the interviewee is familiar with. These were located either in the past of that locality, to an alternative, to a different locality or to an impossible reality. These processes of referencing to different kind of realities have their own common vocabulary: remembering (the currently impossible often in a form of nostalgia), association with another locality (which can also be in the past actuality of that place within possibility), seeing an alternative reality (still possible), and fantasizing (see gray arrows in fig. 27).

³² In the mediums of for instance speech, art or in Folkmann’s specific interest: design.

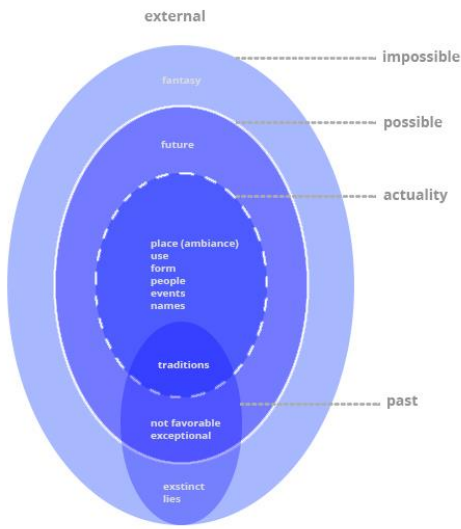


Figure 27 The realms of realities and imagination (own ill.).

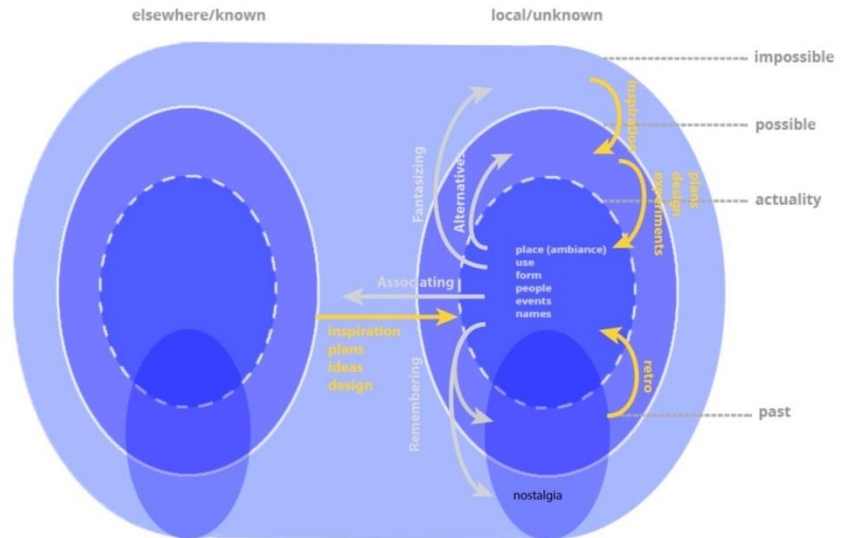


Figure 26 Links between different realities, imagination and creative imagination (own ill.).

The externalization process that occurred after internalization is the superimposing of the imagined onto the actuality. This type of imagination can be called creative imagination³³. Examples of how the different referred realities translated into actuality are shown in orange arrows in fig. 27.

It should be kept in mind that all of these mental acts are performed within the limits of perception, experiences and knowledge of the individual. These individual databases can grow however, as we have seen in the interviews, by expanding the own experiences (for instance fig. 19). Easier and more effective maybe is by absorbing these from the stories of others (fig. 28). The absence of a perceived reality in these stories has the additional joy for the listener of space to construct their own image.

Striking however in the interviews was that imagination was present for all interviewees. This highlights the ability to imagine exists in all of us. Some might be better in a certain type of imagining than others³⁴, but as demonstrated by the interviewees, other's experiences and imagination can help them improve their skills and expand their horizons.

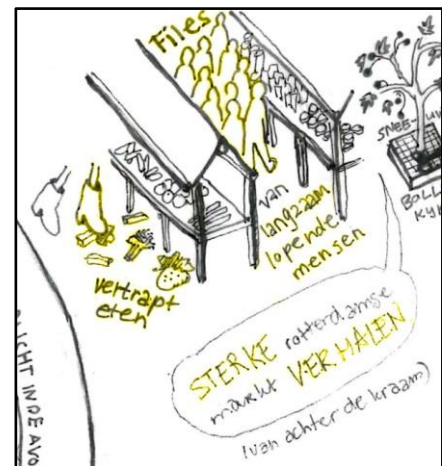


Figure 28 Expanding imagination through other's stories (own ill. according to interview).

³³ When involving the creation of something physical, this is often done in the form of a design process: it is imagined how something possible would function in the actuality and sometimes this is tested in actuality in the form of experiments or surveys.

³⁴ For instance: the ability to associate with other places depends on your past experiences and fantasizing and alternatives are also not activities that we are equally skilled in.

In case of improving a public space this makes me conclude that involvement of the public in the imagination process of a space is possible³⁵. This process can be made accessible and owned by the public by providing for 1) an actuality 2) an few provocative inspirations based on the story of others (from elsewhere, from the past and from fantasy; suggesting the actualities of atmosphere, use, form, people, events and names). For the second step of imagining these design, the expression of it, it needs to be considered, that the production of images is a skill by itself that many do not possess and are afraid to do (also based on experience of the interviews). In this respect the medium of the expression becomes vital for the accessibility of this process for the whole process of imagination. It could be suggested that maybe the public should not be part of the process of visualization, but more the verbalization (of which many grownups were more comfortable). The architect then takes on the task of visualizing the imagined alternative properly for the rest of the process. Then the visualized imagined reality (the idea/plan), needs another round of imagining: imagining how this will be like. This process of externalization is also accessible to the public, as they can react imaginatively upon the new actuality of the created image. After this an evaluation is needed of this session of imagination towards the actuality that it is intended for. The cycles of alternatives, visualizations and evaluations can continue until the visualized imagination gets decided to be created. See this process visualized in fig. 29.

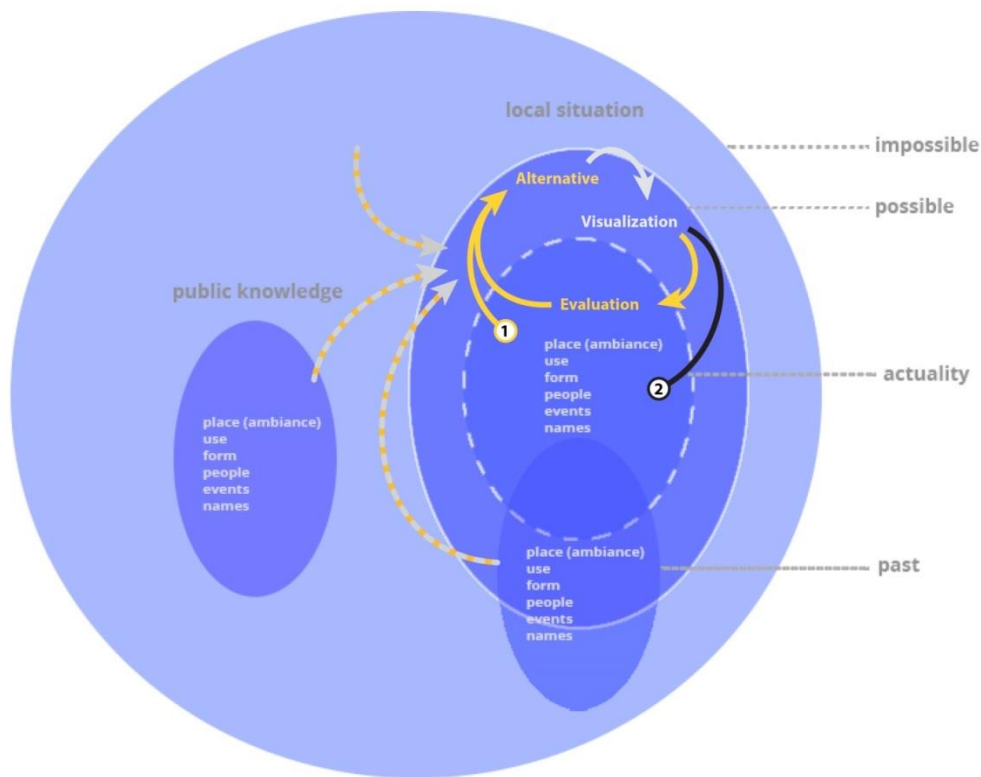


Figure 29 Proposal of making imagining a public activity in the process of designing (own ill.). Orange arrows represent the stages that are capable to become public; grey are stages of the process that are more likely performed by designers.

³⁵ This involvement is assumed to create stronger bonds of the public to the public spaces.

Overall Conclusions Public Experiences in Rotterdam

What types of memorable public experiences that are occurring in the area?

We experience the environment in a process of perceiving (looking around, looking at, scanning and focusing), attributing meaning (understanding and creating knowledge), feeling and creating connections with realities that are not present in the environment itself. Throughout our lives in the public as well as private realm our personal database of experiences gets filled up with experiences that each has their own value. In an attempt to discover the values of locations I have asked people to recover whatever they remember of public locations in the fire line of Rotterdam, giving them as little clues as possible. Although this method is surely not capable of recovering the complete spectrum of memories and values, it did provide a first look into the mechanics of experiencing the public city. Although many experiences were unique, the types of experiences (type of connections made to different elements) reappeared in different places for different people. These categories of ways of experiencing show the ways of being present in public city space in general. This information can become useful for the careful creation of a specific public space as they have shown parameters of perceiving the otherness in spaces (distances, motion) as well as some challenges and solutions (shared imagination). Throughout these activities, we engage in different ways with our environment (more passive or active) which largely depends on the scale of our perceived world, our personal state of attention and our personal frame of previous experiences.

These categories and ways of experiencing are briefly explained below, each of them concluding with the implications this knowledge has for the creation of a socially sustainable public space within the fire line.

Seeing

The limits and conditions of human perception were uncovered: perception and understanding happens in locomotion (passage in time, through appearing, disappearing and reappearing) – a movement outside or inside the perceiver. Examples of these moving scenes: focusing on remarkable details, tracking moving elements or tracing paths of others' live. This is closely related to our limit to perceive one thing at a time. Finally the limit of what is visible to us (the visible scale within our frame) decides how we are able to look at things (grain of seeing), which decides our understanding of things and the meaning we can attribute to them. An expanded frame was often paired with experiences of for instance recognition and atmosphere, whereas smaller frames seem to shape a limited focus on details or objects (for instance icons of recognition were often elements of bigger scale that we remember their bigger shape of, not their specific material details). In this way the perceptible scale (which includes the imaginable) becomes an important factor for the possible awareness of our environment.

This universalized knowledge about perceiving led Benjamin to the conclusion that people are at a state of distraction in the public space. However, I'd like to state that our perception in locomotion in time is maybe much more something like a sequential sensual route of focus.

Throughout the different ways of seeing, there are different ways in which we connect to our environment and to others: in a more passive or active way. It seems that elements of the city that have a value of convention (elements of recognition), and those that have a clear intention to be seen, link us to others in communication (shared experiences we can talk about), but impel the less present states of seeing. It is when we are observing (focus) that we tend to be more aware of our environment. Once in this state we can start to see more of our environment. Often the trigger of this way of attentive looking and the further discovery of the environment after this is driven by surprise. As such, convention, intention and surprise become a scale of triggers for ways of seeing, working as a raising awareness scale of the environment. It on the righter end of this spectrum that a more 'public' experience arises: connecting to the uncertainties and the unknown of the city's urban fabric.

If I relate these conclusions about the mechanics of public seeing with the desire to tackle the problem of a limited connection to public space, I come to the conclusion that in order to start a connection the space needs to allow for active awareness and can use surprise to sustain the connection. Then the conclusions of play (see chapter 3) become valuable: to sustain attention to the public space over time, it needs to provide for newness. This directed me to the importance of designing non static objects and different changing instances as key features to creating a socially sustainable compelling public environment.

At the same time it became important that in order to be a real holistic public space that has the intention to raise the awareness of the varying ways of enjoying public life, the space needs to provide for all the different ways of seeing.

Doing

In doing we often connect to others. The scenes of the connection often decide the presence of others, which has proven to decide often the types of encounter that can take place with the other: private premises were scenes of private experiences or maximal a visual connection to the public; semi-public spaces were scenes of inwards focused activities that provided either a focus of personal activities, social activities with known people or watching and socializing with the other briefly); public spaces were big open spaces that provided for crowd experiences, smaller places with useful elements for encounter in rest and roads as scenes of confrontation and encounter of the other and a place of confidence.

Throughout these connections in different spaces, it is factors of propinquity that decide how we behave towards the other. Like seeing, the limit of our frame decides the type of connection we make: the smaller the spaces, the more direct our contact with the other. Propinquity is preceded by visibility of the other as a factor of publicness. Lastly it is suggested that continuity of movement might be beneficial for the experience of the other.

Relating these conclusions of public doing to the limited use and connection towards the other of many public spaces, I conclude that the city center is in need of more intimate public spaces to enable the more direct connections of the public. This suggests designing for different densities of people. I would propose the introduction of a public area envisioned like a network that first suggest movement by

applying a narrower setup (for public experiences of the roads) and secondarily provides for refuge and public behavior in rest by using smaller open areas with public facilities.

Feeling

In our sentimental perception of environments we seem to have opposing values: some people and sometimes we hate something that otherwise we enjoy. This counts for the presence of other people: the joy of being in a big crowd, being around diverse people, and know about their presence; the disadvantages of being in a big crowd, the unpleasant behavior of others towards ourselves or the shared environment. The way we value our physical environment emotionally is less of an antithesis (more universal rules): we seem to attribute positive and negative values to whole areas and objects in terms of beauty, association and surprise and we judge more specific sensual aspects of experiences. Lasty personal events can form a stong emotional memory.

For the creation of a positive connection to other people, we can conclude from these mechanics of emotional perception that for a public experience, a diversity of public should be ensured and this public should be discouraged to negative behavior towards the other and the space (violence, pollution, vandalism). The space can be designed in a positive way encompassing factors of beauty, association and surprise, making use of sensual aspects of experiences that are generally perceived as positive. Besides this, it should be a safe place (where no negative happenings like accidents are likely to occur).

Thinking

The category of experiences that refers to not the direct situation of the location was governed by the imagining of another situation. Associations made through thinking referred to other areas or objects (places), uses, forms, people or names. The imagination referred to a frame of reference known to the interviewee that could exist in: the past (resulting in the imagination of remembering), another location, an alternative reality (the unexplored possibilities of the actuality), and impossibility (resulting in the imagination of fantasizing).

All these types of imagination can be the source of creative imagination, where the imagined reality gets externalized in a process of imagining how something would and could be functioning in the actuality and represented in the form of plans, designs and ideas.

In order to involve the public in the process of the creation of the public space with the purpose to enhance their connection to it, the skills and limitations of this public needs to be considered. We have seen that we all possess the skill to imagine, but are not equally good in all the types of imagining. To involve the public in the design process I therefore propose the subsequent process: in order to start the process of coming up with alternatives, the participants of this process can take their inspiration from some of the provocative realities of imagination that were presented in the interviews (presented to them in a certain manner). This is now not anymore the personal frame of reference, but a collective one. Of course participants in this process can add their own knowledge as well, which should be encouraged. This frame of reference together with the actuality that is presented to them will form the

basis for a process of public imagination of alternative realities. For the later stages of the creation process of a public design, I suggest the architect to visualize the imagined in a representable way. That visualization on its turn can form the basis of another public imagination process of imagining what this visualization would be like if it would be the actuality. After the evaluation of this process, the cycle of imagining alternatives, visualizing and imagining how this would be can run multiple times until the result is one that excludes harmful effects for the users and the environment and that at minimum takes in considerations the lessons on publicness that we have learnt in the other categories of experiencing. The architect finally can materialize, calculate and dimension the final proposal in a way that it can be created.

2.2.3 The daily public reality of a specific location

What are daily public uses of a specific location?

For finding areas that have a potential in improving their public life, an evaluation system is presented in Chapter 2.3. The area selected in that chapter is evaluated on its daily use in this chapter. This chapter will show what the differences can be between the exceptional experiences narrated by the interviewees and the actual daily use. The daily uses are established by observing the location for a set time. The questions asked in analyzing these places were:

- Where do people pass? What are their motives for taking a certain route?
- Where do they stay to do something? What is it they do there? Is the activity related to the physical environment, to others in the environment, or to the activity or objects they bring themselves?

This results in a marking of routes (walking/cycling/cars) and points combined with written accounts of static activity on a map. The observations done in the intervals of 5 minutes each can be inspected in the Appendix F.3 (Westewagenhoven) and Appendix F.4 (Westewagenstraat). Summaries and elaborations of these can be seen there as well. The main findings will we presented here.



Figure 30 Still from the observation of Westewagenhoven (own ill.).



Figure 31 Still from the observation of Westewagenstraat (own ill.).

While cyclists were present in both locations, the versatility of pedestrians showed to encourage many more public experiences—they stop many more times intentionally or by something unexpected. In doing so, while they stop the potential to discover or interact with the environment rises, which was also been observed to actually happen.

The two sides allowed for different use, both in in movement and in static position. While the street structure on de Westewagenstraat was mainly a transport route, in some occasions with the right limited density, it was the scene of encounter between strangers (caressing a baby) and private uses (dancing boy, kissing). This confirms the public value of streets established in the interviews. The Westewagenhoven were significantly less used compared to the street. The hoven were used often as detour of the street, possibly because this was less crowded or people were more attracted by the view of the water and square with church on this side. The continuing route and diverse niches along the water also allowed for unobstructed running and hiding (play). People went to sit in the niches of this side and took photos of the square. From the street the openings leading to the hoven regularly caused people to stop and take a look inside. A similar curiosity and behavior of discovery was observed towards the closed off block covered with graffiti. Especially cracks in the covering of the window were of interest. All of these observed uses are envisioned in the map of fig. 32.

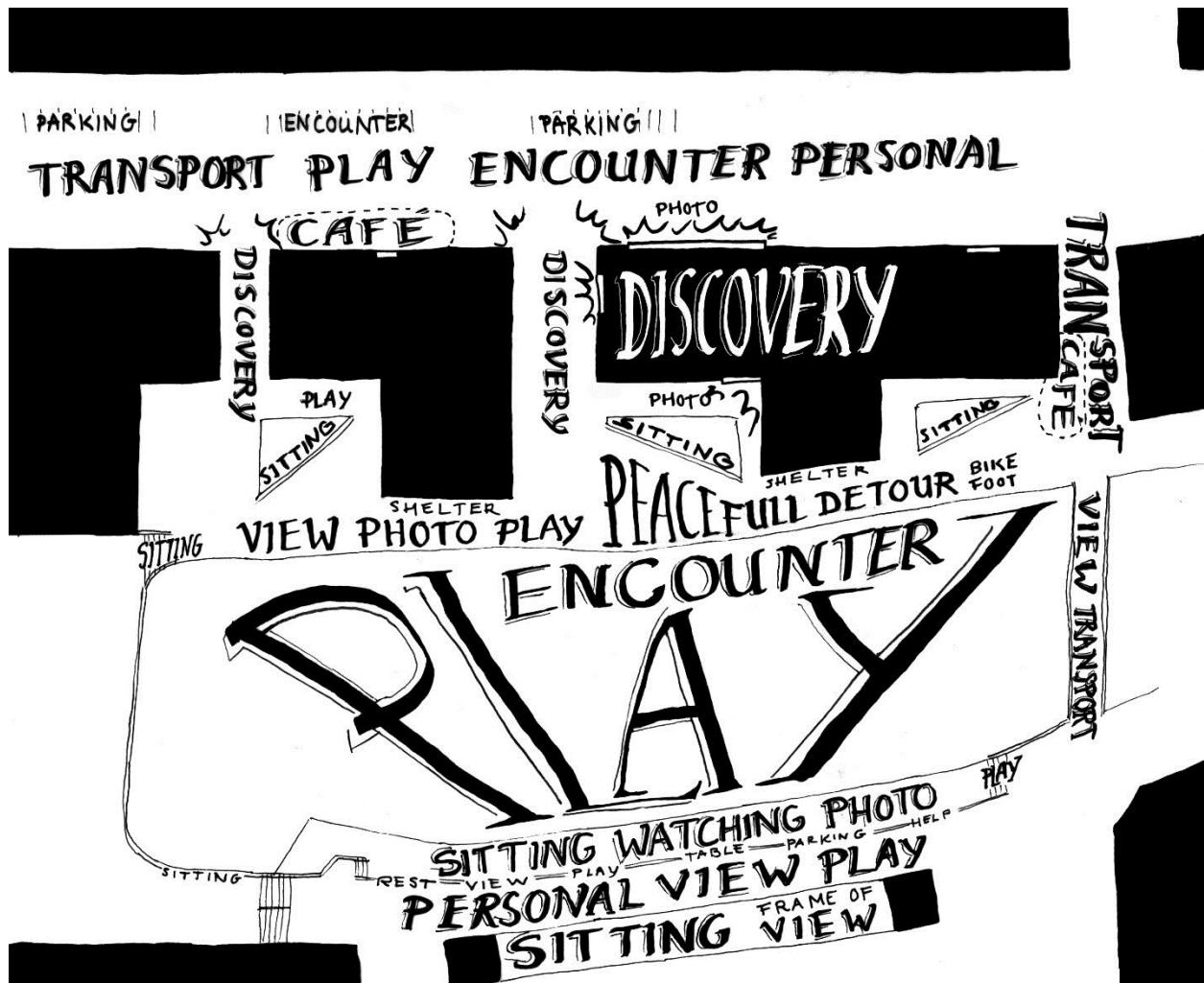


Figure 32 Characteristics of use of spots on the location (own ill.).

Some elements that were present in the location seemed encourage one particular use, while a metal fence on route was used in many ways (beyond protection from falling)³⁶. This shows the opportunistic and inventive nature of people as well as something that allows for multifunctional use on positions on the right location.

So is this chosen area limited in its public use? The Westewagenstraat seems to hold some diversity of use because of it being an almost solely passage area. The Westewagenhoven seem to draw few people that seem to not mind the loneliness over there, but they hardly stay for a longer time as the place does not provide any facilities for longtime use and them being in full sight of the crowd sitting on the other side of the water plus the lack of sunlight does not help much either. So yes, both can be equipped with more facilities for different uses.

Also, are the experiences on this location less memorable than elsewhere in the city? If we compare the activities of this place with the types of experiences that people remembered from the interviews

³⁶ Used as improvised leg help, table, and bicycle parking.

(seeing, doing, feeling and thinking), there were a few types observed. Of the category seeing, the *tracing of others* was observed – the boats moving around in the canal. Also there was the graffiti that was *intended to be seen* and the peeking through the cracks of the same building proves that people have observed and noticed these *remarkable details*. Lastly potentially the openings from the Westewagenstraat to the hoven which give a view to the square with church could be part of the experience of an *atmosphere*. In the category of doing, social and personal activities were appearing. The occurrences and activities in these match the layout and descriptions of *social centers of consumption* (cafés), *leisure centers* (water boats) and *in-between spaces* (the street). Within the area there was no clearly defined open smaller or bigger public space nor an indoors public space. Besides the repetitive pragmatic uses of the area, the thing what makes us remember is often something new or extraordinary. In this respect it are likely the moments and object of discovery, playing, the encounter and socializing have a high chance to be remembered. Considering the limited time spent by individuals on both sides of the area however, the place is less likely to possess very memorable moments.

And finally: are the experiences in this area public? As noted earlier, although many of the pedestrians were in the company of others, still most of their activities were taking place in interplay with the space around them. The presence in an area surrounded by otherness was enjoyed by many in various ways, more active (for instance discovery) or passively (using as transport when looking on the phone). Also, all areas are accessible to different people independent of their physical state (old people, people in wheelchairs and limping people were observed to pass into the Westewagenhoven as well). Only the one stairs might prove a problem, but there were other routes to reach the same point as well.

2.3 Determining public spaces that can be improved by local interventions

How do you determine the public areas that are underused and have a potential to become good public spaces?

- *What are places in the area that have public disadvantages?*
- *What are places in the area that are of lesser public interest?*
- *What are places in the area that have public potentials?*

In the previous chapters the context of the problem of disconnection of the public was explored, as well as directions and measurements that have the potential to solve this. Besides delving into literature, this effort focused on the modern center of Rotterdam, where it was posed that such disconnect exists in some way or another because of the way the spaces are setup. Through empirical information, we discovered the ways in which the public connects to the spaces in this area of the city. This gave rise to the conclusion that although the use of some places appeared to be limited to a few activities and a limited variety of connections, the different ways in which we value these areas in the city altogether shape our personal set of experiences that all have their own effect and function for our personal learning and understanding. This is the book of stories that we carry with us every day. Corollary of this conclusion is the idea that it is not spaces that are already valued in some way that are in need of redesign. Instead, I'd suggest the places that were not mentioned - and thus appear to be the scene of no memorable public experiences – to be the candidates for an improvement that seeks to inspire the public use and experience of this place. Besides this however the location has to comply with some

characteristics that were defined in the chapters that define the potential that the place is actually going to be used publicly. In will present these characteristics in this chapter as a set of hierarchical demands for the choice of a location that is in need of public use and allows for it:

Relating to safety, sound pollution and the pace in which we can truly discover something, the location needs to be

1. Accessible to almost solely pedestrians (no cars).

As suggested in chapter 2.2.1 *Physical conditions of the public space* to create the meeting, lively spaces (which allow for multiple uses) and inclusivity desired in the 2015 Wentholt survey, it is important the area is not governed by heavy traffic. It is As shown in the observation also (chapter 2.2.3), pedestrian pace with its versability allows for a diversity of public experiences that cannot be experienced in high speed. Areas in Rotterdam are marked in fig. 33.

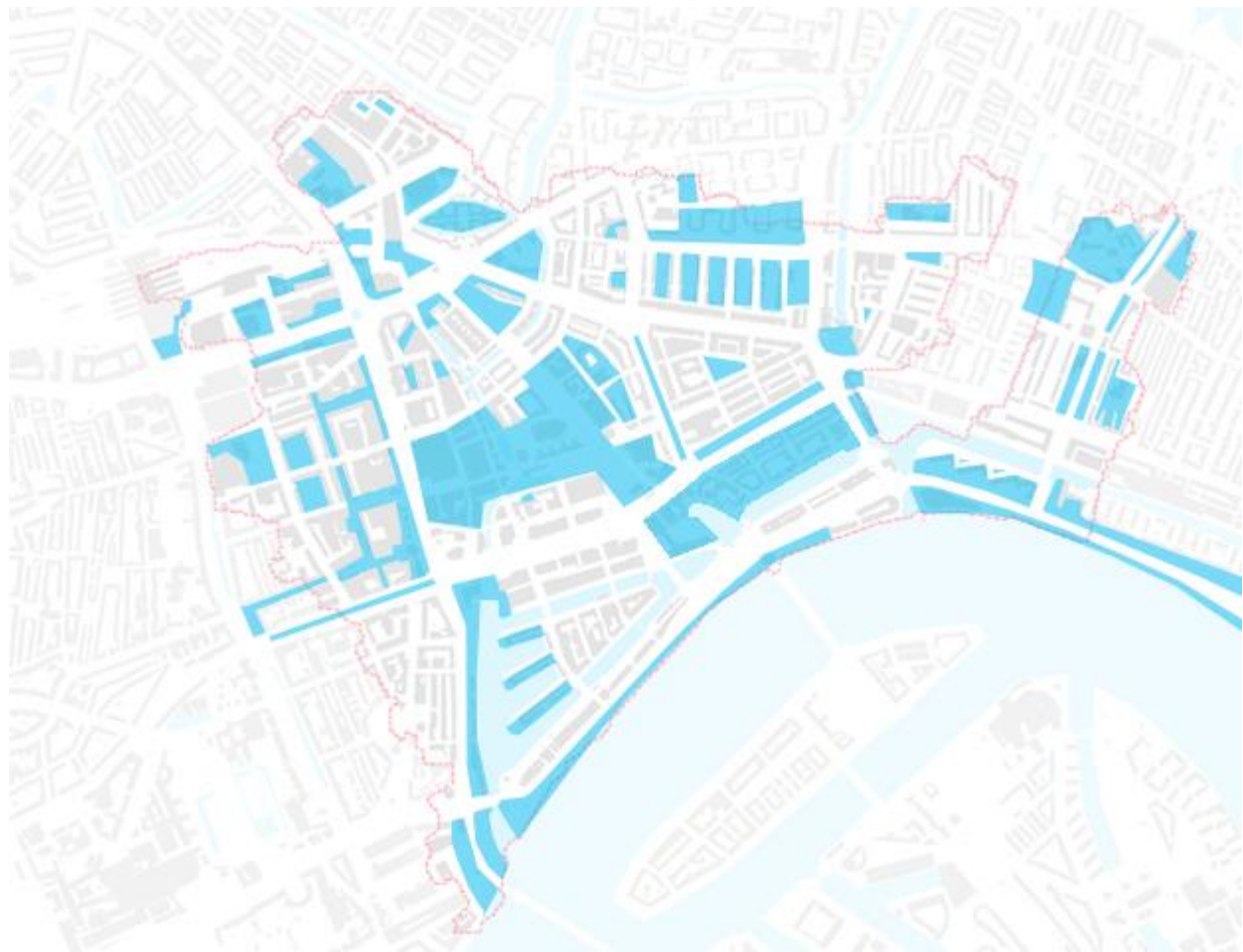


Figure 33 Areas only accessible for pedestrians, disregarding narrow sidewalks (own ill.).

2. Not bordered by streets that contain car traffic.

This increases safety of pedestrians in the area, especially when engaging in unexpected activities and encounters (for instance playing dogs or children) in a state of distraction.

To raise the chance of the place to be used by a diverse public throughout the day and allowing for activities not in transit, the place is located on:

3. Areas bordering areas with a mix of inhabitants-other functions.

This enhances the meeting of others and the liveliness of the space. See the areas of mixed use in fig. 34. Combined with characteristics of 1 and 2, the borders between mix-use and pedestrian accessible areas are shown in fig. 35.

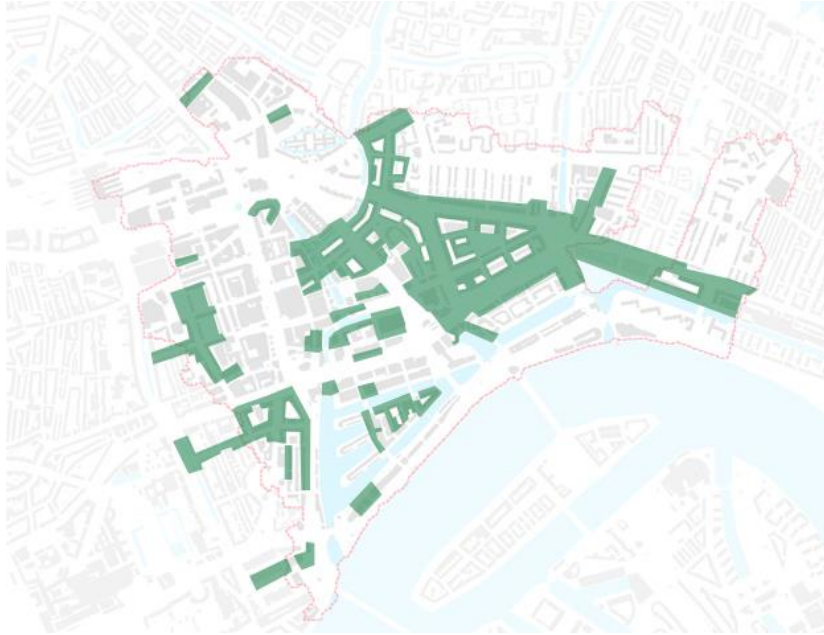


Figure 34 Areas with potential of meeting the other: the public spaces between mixed used building blocks (own ill.).

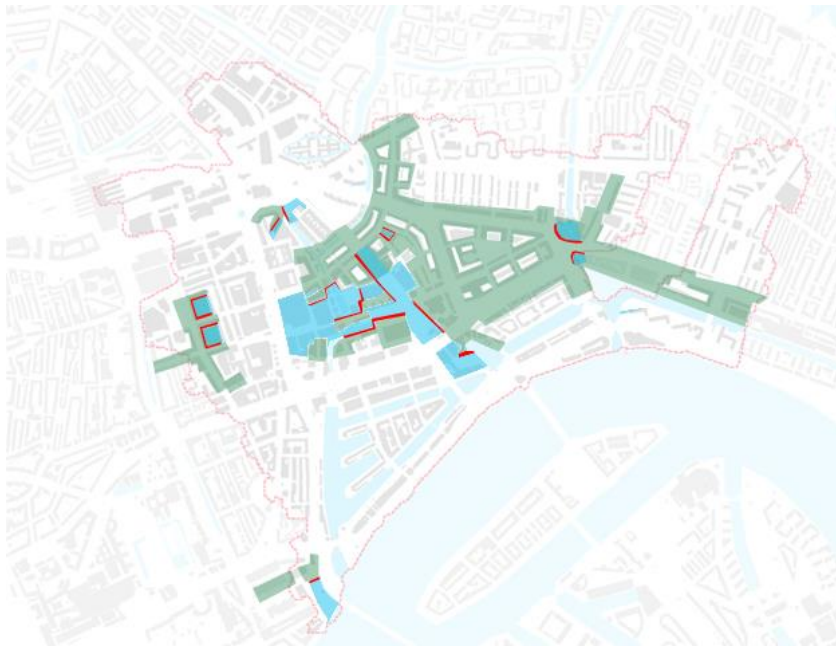


Figure 35 The borders between mix use (green) and pedestrian accessibility (blue) (own ill.).

To allow for the activity of discovery and drift, these areas are continuing spaces (as suggested by Baird (2011) and confirmed by activities narrated in these kinds of spaces in the interviews), so:

4. No islands
5. No endpoints

These suggest such places are part of a network of non-car streets and areas. Within the areas remaining after applying 1-5, we see the pedestrian area of fig. 36 in blue and the borders of mixed use areas dotted in red.

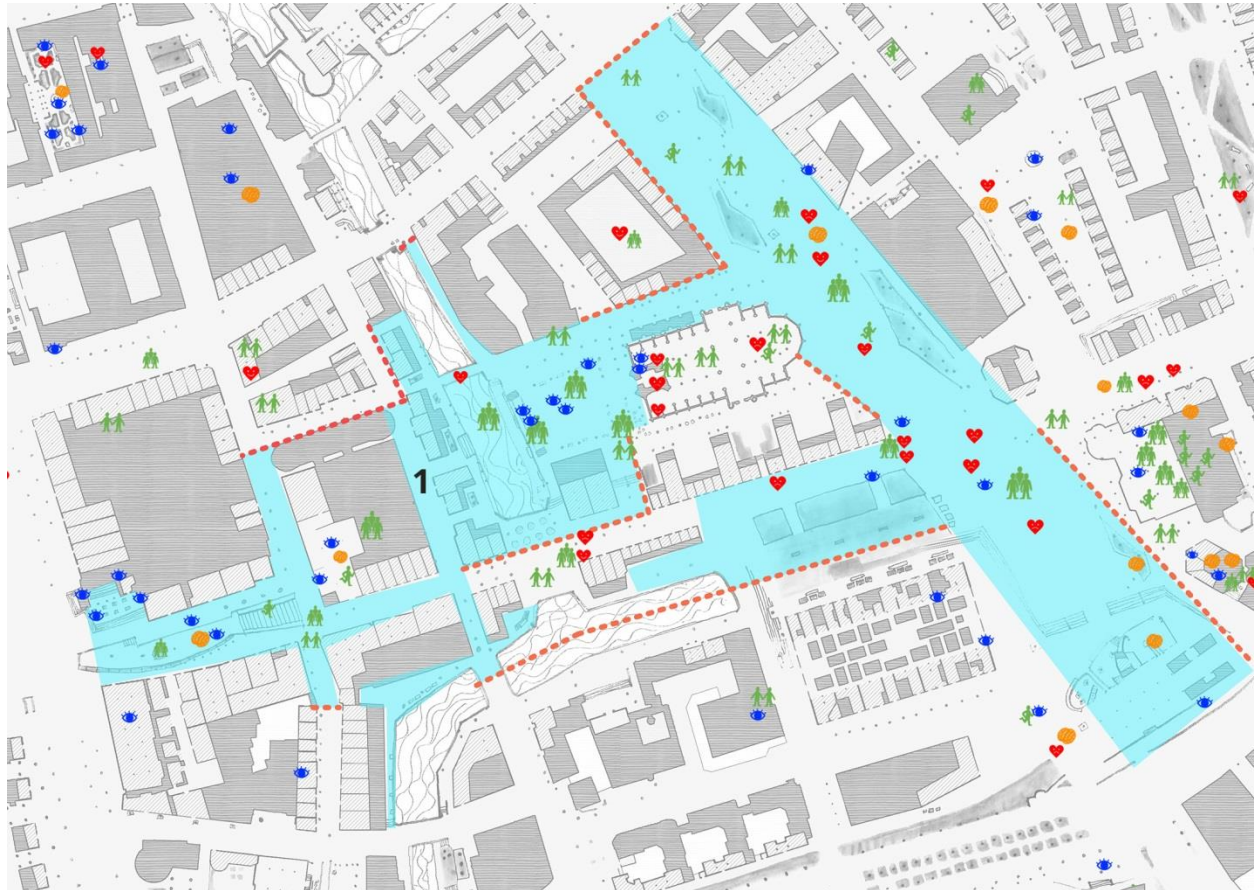


Figure 36 Location that complies with potential to become a public space(own ill.).

Other characteristics that appeared to be important to enable and welcome discovery of the otherness of the public space, talk about the structure of these places:

6. No big and fully open areas.
To allow for the shy to also use the space and to provide for shelter against harsh climate.
7. Preferably a linear structure (allowing for experiences while passing), connected to bigger public spaces (that are not directly in sight).
This would allow for public experience while passing in distraction and the opportunity for public experiences in more static position (sitting, watching, playing etc.).

Finally as explained earlier, there are signs of a current disinterest in this place, which can be discovered by:

8. No current significant memories in this space.

See the coding of the interviews projected on fig. 36. Places that already have a value are not in direct need of improvement of the public space. Also places that have a negative spatial value, would benefit more from a problem solving approach, rather than one that seeks to explore unseen public potentials.

9. Not used or used for limited purpose.

To be established thoroughly in an observation of the candidates.

This place gets extra points if besides these requirements related to allowing for public experiences by humans, these places are:

10. Places that can expand and grow.

This flexibility allows for changes in future public use.

11. Places that are scenes not only of humans, but also of the misanthropic aspects of publicness.

Ambience deciding elements like the presence of sun and water, and also the presence of other animals and nature to discover.

The remaining network of pedestrian space of fig 36, shows a few streets without specific public interest (icons of experiences). It is only the street marked with number 1 that has a structure of a street that can be expanded to smaller public spaces. Its location next to water and a square with church, gives it added value for different potential experiences (no. 11). The blocks in this area are empty, which give the area the potential to grow in the future. An improvement of this location should consider the current use of it to retain important functions and to enhance and expand upon the current public values of the place. As suggested in no. 9, this can be done through an observation (see chapter 2.2.3 *The daily public reality of a specific location*)

3 The potential of play and design for revitalizing public space

The second section will examine the potential solutions play can have in creating a more public space:

How can play and design improve public experience?

- *What are the conditions of play?*
- *What are the potentials of play for public interventions?*
- *What elements of designing are compatible with public play processes?*
- *How have design methodologies used play until now?*
- *How do cases use play in their design process to revitalize underused public space?*

This section starts out with theoretical explorations as well to understand the potentials play can have in the design processes for improving public spaces. Subsequently three case studies will serve to evaluate how play can be of use in revitalizing underused public spaces.

3.1 The conditions of play

What are the conditions of play?

In this section I will introduce play as a concept that has potentials to be useful for public applications, especially fit for the problems of the public introduced in the previous section. First I will discuss the existing discourse on play, after which I'll crystalize this into conditions for play. Together, these give an overview on how and why play experience comes into being, pertains and perishes. The comparison with the public experience will be made and a suggestion on the application of one distinctive play type that is naturally applied in the design phase of interventions in public space: imagination. That will consequently be explained further in the section on design.

Preceding discourse

Although we all engage in play throughout our lives, the logical tradition of written accounts in academic circles seems to be troubled by this type of behavior. The first to focus his literal efforts in creating a theory of play was Johan Huizinga. In his 1938 *Homo Ludens: A study of the play elements of culture*, he tries to explain the role of play in the emergence and evolution of culture, arguing that "culture arises in the form of play, and that it is played from the beginning" (Huizinga, 1950). Although not all of his connections to culture have proven to be solid argumentations or relations (as criticized by for instance Gillin (1951) and Motte (2009)), he did provide his successors with an influential definition of play as "*a voluntary activity or occupation executed within certain fixed limits of time and space, according to rules freely accepted but absolutely binding, having as its aim in itself and accompanied by a feeling of tension, joy and consciousness that is 'different' from 'ordinary life'.*" (Huizinga, 1950).

Roger Callois, in his 1961 *Man, Play and Games*, points out the one sighted perspective of Huizinga, bringing to our attention he mostly talks about play in the form of competitive games. His own writing is focused on correcting this mistake and properly categorizing play into: *paidia* - free play (unstructured and spontaneous behavior) and *ludus* – game (structured activities with rules). The latter he further categorizes in the elements *agon* (contest), *alea* (chance), *mimicry* (simulation) and *ilinx* (vertigo) (Callois, 2001). Thereupon however, Callois seems to be taking his examples and subsequent conclusions, like Huizinga, from the field of *ludus* and specifically of the agonistic type even more than

Huizinga. This can be seen in his own definition of play, which he does by describing the characteristics (note the resemblance with Huizinga):

An activity which is *free* (not obligatory); *separate* (within its own limits of time and space which are fixed in advance); *uncertain* (unknown outcome which causes the involvement of the player); *unproductive* (creates nothing and once it ends, the situation is identical to the start of the game); *governed by rules* (which suspend ordinary laws and behaviors and that must be followed by all players); *make-believe* (awareness by players of the reality of the play being different from the real life) (Callois, 2001).

None of these early writers however seem to provide us with an overall, more holistic and inclusive definition of free play. Moreover, they both carelessly interchange the words play with games. Jaques Ehrmann in his 1968 *Homo Ludens Revisited*, puts these and other critical notes to their work and proposes a more nuanced perspective of play, less based upon dichotomies. His main points of critique are concerned with the uselessness/unseriousness/for nothing and the assumed 'reality' (Ehrmann & Lewis, 1968). Instead he "argues for a conception of play as articulation, as a mobile process of relation wherein similarity and difference communicate along lines of productive tension. When we attempt to understand that articulation, we must discard the subject-object dialectic; it is no longer a useful heuristic given the fluidity of the relations in play." (Waren Motte about Ehrmann (Motte, 2009))

Huizinga and Callois might have made questionable and crude statements as criticized by Ehrmann, but over time, many of the aspects of their definitions, were developed and articulated in more detail in the work of many researchers of different fields and with different motives and objectives. Most of these tend to describe the benefits of play behavior for for instance learning processes and personal development (of both children and grownups) (Lester & Russel, 2008), (Kolb & Kolb, 2010)), for social arrangements (Sandelands, 2010)) and emotional processing (Erikson, 1950). Similar results were accounted for concerning the brain development in mammals in general (Bekoff & Byers, 1998), (Fagen, 1981), (Smith, 1982)), suggesting play behavior is beneficial for the integration of cognitive, social, affective, sensi-motor systems.

The few authors that did dare to attempt an overall definition produced whole books reviewing extant rhetoric on play. One such attempt was done by Brian Sutton-Smith. In his 2001 *Ambiguity of play*, he concludes that from all the different perspectives that play got explained; the most binding factor is the variability. He suggests that "*as a form of mental feedback, play might nullify the rigidity that sets in after successful adaption, thus reinforcing animal and human variability.*" (Sutton-Smith, 2001).

Despite these academic writerly efforts however, maybe the best way to go about play is by actually doing it. Artists, having made playing into their main occupation, seem to be most apt for this. One inspiring example of these that uses the written word to its limits is Raymond Queneau, that among others has created a book of 10^{14} poems by playing with the flexible structure of the sonnet (Queneau, 1961).

The conditions of play

For I've found no satisfying description of what free play is, in this section I will describe the aspects of play that multiple writers have written about (in their own words). Instead of a definition, I'd like to structure these as conditions, as all of these themes need to be obtained for some situation to be considered play. You might notice from these conditions, that they can take many forms according to the type of play that is happening.

- Emersion in full focus and attention with the activity

Many people when asked about the main reason they play, will answer 'because it's *enjoyable*'. The origin and nature of this feeling when playing has been talked about by many writers.

Lazzaro (2004) puts forth a few categories of the enjoyment caused by play: fulfillment of a goal, sensational triggers, social experiences and being emerged in the play activity (Lazzaro, 2004). Of these types of enjoyments, the last might be the most specific to play in comparison with other types of behavior (and also occurring simultaneously with the other types of enjoyment suggested in play). It is Csikszentmihalyi, who in 1975 described this as "flow" (Csikszentmihalyi, 1975). According to him, this feeling of flow is accompanied by (one or more of) the following aspects:

1. Clear goals: achievable expectations and known rules.
2. Concentration and focus: no interruption of the emersion.
3. A loss of feeling of self-consciousness.
4. Distorted sense of time.
5. Direct and immediate feedback: player as an active agent being able to alter its behavior according to his successes or failures.
6. Balance between level of ability and challenge.
7. A sense of personal control over the situation.
8. The activity is intrinsically rewarding.
9. People become absorbed in the activity.

Earlier, in 1971, Csikszentmihalyi and Bennet (1971) explored the process of the player merging with the activity. In this they focused on the self and the experience of "selflessness" during play, as they describe it: "how it [the self] is forgotten when action is plentiful" (Csikszentmihalyi & Bennet, 1971). They explain that "as long as a person is playing, his selfless attention to only "his" actions transcend his referential (i.e., social) identity, and the ability to further negotiate breaks down." As they suggest, this is a specific feature of play, which can be contributed to the restrictions set in play: "actors are absolutely bound to a limited set of actions and to identical accounts of those actions; play is a system of no deviance." It should be noted that the examples which they base their theory on, are only games (a restricted form of play). They continue to explain that because of these restrictions "no viewpoint other than the player's viewpoint is necessary-the social self becomes superfluous, and the player can merge with the process in a state of monistic awareness." Csikszentmihalyi in 1997 adds to this, that from the factors he identified in 1975, for flow to emerge it is most necessary that a person encounters a sufficiently challenging activity while having sufficiently developed skills (no.6) (Csikszentmihalyi, 1997).

Lloyd Sandelands (2010) formulates this aspect of play as the “distinctive merger of play”: “people can become so identified with what they are doing that they become one and the same (self-actualization) and this merger comes to seem a special moment in their lives (a peak experience).” (Sandelands, 2010)

Play can thus be understood as a moment of emersion in an activity. The emotional thrill in which this results is the play specific motivation for acting (besides other motivations the activity can also have). It is this feeling that draws our attention to the play activity and keeps us there, focused only on the play, for as long as it takes. Crucial for the occurrence and continuation of this moment of emersion in play, according to Csikszentmihalyi, is the balance between personal skill and the challenge of the activity.

Although challenges and skills might differ greatly between individuals (making situations that are play for one, a headache, a normality or dull for others), Steven Connor makes a suggestion that there are some objects that evoke play action by us humans naturally, maybe instinctively and almost universally. This object “[...] seems to escape its own finitude, its dourly objectish being-there, to go beyond, or spill to the side of, what it merely is or does. I am going to call this kind of thing *a magical object*. One way of putting this is to say that such objects are invested with powers, associations and significances, that they are therefore not just docile things, but signs, showings, epiphanies.” (Connor, 2013) On the origin of the attraction of these objects as play objects, he remarks: “it is that they [magical things] seem to offer richer and more indeterminate kinds of affordances³⁷, making them seem in various ways excessive to their ordinary or assigned uses. Magical things all do more, and mean more than they might be supposed to. A ball is a magical object because of its affordances, its way of proposing itself for use, are at once so irresistible and yet so seemingly open!”. It would be interesting to investigate this matter of intrinsically attractive things for play more thoroughly and also outside of the realm of objects (for instance architecture). As his book suggests, these objects of use, because of their affordances, trigger interaction and imagination with it. It is not unimaginable that there are spaces that have the same effect: that because of something in their physical appearance have an irresistible appeal to use and imagine with it, in which the appeal lies in the suggestion of the seemingly endless things you can do with and in the space.

Besides the affordances for play that lay within things or situations itself, there are other clues to what it is that lures us into the act of playing. One of these, presented by many authors in different ways, I'd like to call the condition of contrast:

- Contrast to the ordinary

This condition likes to state that in order for play to occur, aspects of the environment and the activity need to be in contrast to the personal and/or perceived 'ordinary'. As such 'contrast' points towards the physical environment, the nature of the activity and the personal frame of reference of the player.

Huizinga in 1938, as mentioned before, put forth the statement that the feeling play arouses is different from the “ordinary life”. Instead of saying the result and the reason of playing is this extraordinary

³⁷ The possible uses that the object or environment affords.

feeling (see previous condition) only, I'd like to point out that 'extraordinary' mostly applies to the activity itself. "Ordinary" in my perspective thus refers to whatever is the norm or habit (most used way of doing) of the person at play. It should be noted here however, that even ordinary activities have the possibility to become play, and might be play from the very beginning³⁸.

Although there are few situations and activities people can engage with that could be called 'extraordinary' universally, the 'extraordinary' nature of the activity as perceived by the player is highly subjective and dependent on the frame of reference of every person. Another contrast to the ordinary for every player personally is to social boundaries which involve others. Turner explains this as play being "free from normative social structure" (Turner, 1974). Because of the emersion with the activity, any boundaries beyond the ones of the play activity vanish. Roles, hierarchy, opinions and conventions that are useful (or destructive) in daily life to make our social interactions smooth and effective are no longer of any value as a new reality is accepted in emersion. There are some forms of play that are even entirely based upon the changing of the normal social order (theatre or carnival).

Besides the contrast to personal habitual activities and social norms, there is another way in which play can defy the ordinary: it can leave the realm of the physically present or even possible order. This relates to the environment in a way that it builds upon it and creates a whole new reality, where the real can merge with the unreal, the imaginary. Play as such can be in contrast to the perceived reality, by adding a layer of imagined reality to the perception of the player. This 'unreal' dimension of play can take upon the form of extraordinary, imagined rules (in the case of games Huizinga describes), but can also expand towards the elements that are used in the play (being not present).

Now that we have set some domains of the ordinary towards which play can be a contrast, it becomes interesting by what means the contrast towards these domains comes about in play. In this respect I distinguish two stages: the start of play and the play itself. As I noted earlier, there might be an irresistible aspect of an object or situation that makes us want or have to play with it. This can be attributed to characteristics that make it playable (for instance its versatility) – the suggested affordances to play. Another way how this attraction can come about however, is by cheer contrast towards the environment. The object or situation might not be naturally good or easy to play with, but it might just shake our ordinary perception because it is so different, resulting in a raised state of awareness and presence and therefore opening up the mind for other perceptions (also the playful engagement to reality). This one trigger to play for a brief moment puts our attention towards a certain new way of looking, it opens up the ordinary. Once the 'playmode' is opened, the focus stays, which leads me to the second stage in which the contrast comes about: the play itself. The attention that is set, allows for the focus or reduction of the play to single manageable factors. This is where the so called "playspace" of Huizinga comes in useful: the notion that play is free, unreal and constricted in time and

³⁸ Imagine for instance the daily route to you work, where you have to pass a certain street always. There can be many ways of passing this area: going as fast as possible, following an obstacle track, trying to look in every window counting the televisions, imagining narratives with the scenes you see, imagining the thoughts of people and animals etc. In this way your route and daily routine becomes play. As this process of active engagement with your environment demands a lot of energy, for the sake of (efficient) energy distribution in life, we all do some things repetitively, as a habit.

space. Turner refers to it in similar manner as a state of “temporary freedom”. Although I’m critical about these broad statements in reference to play, it talks about the relationship of the player and the play aptly in defining the playspace as a “bounded space created from within, by the nature and structure of the game and by the conducts of the players themselves who are responsible for ordering and shaping the fate of the game.”³⁹ (Gadamer, 1992). Opposed to many situations in ordinary life, in play the players themselves are active agents in creating the play experience. The whole play experience forms a contrast to daily life exactly because you can create, edit and change the rules yourself.

Thence play sets itself apart from the ordinary activities, social norms and the perceived reality by means of focus, reduction and restriction. These boundaries are fluidly directed by the players. This behavior can be triggered by play affordances and/or by a perceived contrast, of which the latter results in a raised state of awareness and presence needed to commence the play.

As I talked here about how the play sets in and functions governed by the players and compared to different realms of reality, next it becomes of interest how play persists its charms. This I summarize as the condition of discovery and novelty:

- Discovery and novelty – the ability to learn and explore

Csikszentmihalyi in 1975 and 1997 stresses the importance of the balance between level of abilities of the player and challenge for the occurrence of flow. The main attraction once in play, is the new perception (the new reality that the player has become aware of: the trigger and the boundaries he made) and seeing how far he can go with this. The more restricted and rigid the boundaries (according to the nature of the play (the rules and elements used) or the player), the sooner play will come to an end. So not only is the occurrence of play dependent on the balance between skills and challenges⁴⁰, ultimately it’s about a balance between newness (possible changes) and skills. The attraction lies in the discovering of the new and learning how to attain and manipulate it according to the play that you have defined. A level of unexpectedness raises the attraction of long lasting play.

Discovery and novelty are obviously a result of a contrast and a raised awareness. It is in this related to the previous note on contrast to the ordinary by using unprecedented combinations of familiar elements.

The balance Csikszentmihalyi and Bennet link the urge for novelty with, is the trinity of boredom play and worry: “play emerges out of the context of everyday life whenever the latter becomes too worrisome, and slips back into everyday life whenever the play experience becomes boring.” (Csikszentmihalyi & Bennet, 1971). I would add that play is not only played for the relief of everyday tensions, but (mostly these days) because of the opposite statements: whenever everyday life becomes too boring, one is likely to play and whenever this play becomes boring (no novelty value is reached), one either changes his attention to another play, changes the rules of the play or slips back into everyday life routines and conventions. Another scenario for play to emerge is by temptation:

³⁹ Note that this does not only apply to games, but also to play as a whole.

⁴⁰ Which is the case in games.

something different from what you know, is happening/can be observed. Like this, one is “lured” into play (intuitive attraction to the different/new).

When making extensive use of imagination and external (versatile/unexpected) stimuli in play, it is possible to reach a great depth of options to explore. Even greater these can become when playing with others, as more imagination (a skill), newness and unexpectedness (the others) are added to the range of the play. Advantage of these forms of play is also that they can be performed also regardless of the physical context, and at any given moment (in your mind).

The longevity and attraction of play can thus be explained through the balance of skills and newness: the ability within the play to discover and explore (with the context, the boundaries and therefore with the player himself). It can be used as a relief of ordinary tensions, as an escape of boredom, or done out of an irresistible urge. Certain forms of play (involving imagination), as well as the inclusion of more context (elements and more players) have the potential to evolve into many directions, which increases the attraction of the play.

Lastly, there is a condition which the previous authors have talked about, which I’d like to call inclusiveness and acceptance of the other:

- Inclusiveness and acceptance of the other

As mentioned before, play takes place in a raised mental state of awareness and presence. It is in this context that the play gets formulated. In this state, the player is open towards a new reality which consists of elements in its context and imagination that can be interpreted and connected in new ways according to the rules that he makes up. This way, the player in its play becomes accepting of elements in its environment that he formerly had another or no relation with. The intent of play itself is the new relation with this ‘other’ and is therefore not only accepting, but also inclusive.

These conditions get an extra dimension in case of social play, where either in the form of the structure of a game or through other often clear, unambiguous play-signals among each other, the desire is expressed to engage in a friendly playful, non-aggressive manner. Because of the acceptance of another reality (the new reality of the play) by all players, previous social relations are forgotten, “the traditional theoretical conflict between individual and society (or monism and dualism) is irrelevant for a man at play.” (Csikszentmihalyi & Bennet, 1971). Also as every player knows the play reality is different from the real one, any judgement on mistakes, failures or lack of skills within the play, are forgiven once the play has ended. Moreover, the effects of this freedom and acceptance felt within the social playspace, can have further reaching results in the ordinary lives of the players. Kolb demonstrates this in his analysis of a voluntary softball league where the main (unspoken) rule was maintenance of the space as a ludic learning space for all participants (accepting their shortcomings and encouraging their development): “Play signals during the game kept the balance of agon and paidia in check, preventing the space from collapsing from within.” (Kolb & Kolb, 2010). The benefits of this positive carefree environment and the acceptance felt there often radiated to the ordinary reality and perspectives of the self and others also outside the playspace. Sandelands might be a bit over expressive, but he boils it

down to the same thing, defining play as “the creative dynamic of human community [...] the form that love takes at the boundary of fantasy and reality where new social arrangements arise to take the place of old social arrangements” (Sandelands, 2010).

So ultimately, as play operates in a different (constructed) reality, open towards new interpretations and realities, it is inherently inclusive and accepting of its environment. This nature of play can have far reaching influences in the ordinary lives of participants of social play.

The mechanics of play

In search for the puzzling meaning of play a list of conditions was set out to which all types of play behavior adhere in order to be considered play (both free play - paidia and games - ludus). From those findings the following description of the way these conditions occur together in play appears:

Besides conscious exerted play that has the intention to reach certain goals (like learning), play behavior often evolves out of boredom, tensions in ordinary life or an irresistible appeal of situations or objects for play. The play behavior can be triggered by inherent play affordances of situations or objects, or by these objects and situations being in a significant contrast to its environment. Once by these causes a raised state of awareness and presence has been reached, the accepting and open mind of the player is ready to construct the playspace: the boundaries of the play, created with the reality around the player, his own imagination and other capabilities (for instance his known skills). The joy experienced in the play itself emerges then firstly and exactly because of this construction of a new reality and the leaving behind of the known of the ordinary life. The focus that emerged from its beginning and penetrates through the limitations that the player has set himself in the playspace, captivates the player in the flow of play: the enjoyable feeling losing the self in the emersion with the activity of discovering and exploring. Fueled by personal skills and newness, this process comes to an end when either one of these two in the balance fails to evolve (or if the focus is broken by external factors). According to the nature of the play (the rules and domains it covers), the relationship it has with its environment (present or imagined elements and other players), the development of skills of the player and the flexibility of the player in the designing of the play, the play may become an ever-lasting experience. With the help of others for instance, a social play can be constructed that can generate more diversity and newness deriving from the other players. Besides giving all the enjoyment above, the acceptance of and emersion with the new reality of these social plays by all players, result in a solidarity and construct of social value that can be of great meaning to the ordinary lives of the individuals, as well as the society as a whole.

3.2 Play for public benefit

What are the potentials of play for public interventions?

As we have come to understand play in this chapter and the characteristics of public life in the city in the previous chapter, I would now like to state what potential value play behavior can have for the social problematics of modern city live and the modern city environment. It is play behavior that addresses

these shortcomings of public life and commitment as well as suggesting a more durable solution for it (i.e. a repeatable method).

Play is a state of awareness which is inclusive of its environment and non-judgmental. This is a perfect condition for public connections to occur, as it tackles the distracted state and the prejudgment of others. Also, in the focus and enjoyable tension of flow, nothing but the play matters - all daily (social) concerns evaporate. Therefore this state overrules issues of trust or prospects of an uncertain future, for it is not the result that matters. Play is the discovery process of an unknown defined as a balance between defined rules combining a challenge and personal skills. When these rules are directed not only towards each other but also dependent on each other, play can form the catalyst of social public behavior that makes possible future bonds as well. When at the same time evolving around raising an awareness of the environment and unlocked potentials that are hidden within public environment, play can also be an important part of creating a proactive public that dares to use the public space to all the potentials it has.

The use of play for public purposes is however problematic on the point that the main characteristic of the public space is the unknown other. How can you make play accessible to all (reduce exclusion to a minimal and increase attraction to participate) and how can play become instrumental with such a diversity of characters - having their own diverse skills and therefor definition of challenge? A few solutions to these questions were given in the review on play already. First, play is a voluntary temporary act – one only plays for oneself and when enjoyment and flow is finished or broken off, play stops. This lack of obligation is an attraction point for people: it includes also the people that have only little time to spend and excludes the ones that don't have time to spend at all. The issue of challenge can partly be solved by play which introduces itself to the player through intrinsic play triggers. Another universal way of exiting people for play is by presenting something unprecedentedly new. The issue of diverse skill and the persistence of challenge can be solved by using a skill which we all have and introducing newness in a structural manner. Suggested for these laid in the limitlessness of imagination and limitlessness newness of others' imagination.

As play is a temporal engagement to your surroundings, this poses another question: in what sense does play has lasting effects on creating a sense of awareness and creating an active attitude towards the surrounding? In this respect, I suggest play must be part of a bigger structure of interventions. A place in the city must be reserved for this awareness, and as the public changes continuously, it is important for all to participate so to ensure the sustainable social structures of a sense of ownership and democracy. Applying the theory of newness here itself, implies that in such a bigger structure, it can be the participants that create newness for other generations of participants. This suggests the creation of a set place as a shared memory and reminder and an overarching (almost) infinite renewing structure of series of play fueled by its participants, targeted on multiple aspects of awareness of public space. Moreover, such a place, applied to the modern city center of Rotterdam will be a welcome contrast to the overly higher up designed spaces in the modern center of Rotterdam.

For the first steps in the creation of such a place, we can refer to the creation cycle of space which starts by designing, particularly the imagination of what is desired. Firstly I'll describe more precisely the role

imagination has in design in the next chapter and then I will go into examples of cases that have used play as a method of creating a public intervention where one was needed. This dwelling on public imagination plays will serve as an example case of the theory of play in connection with public awareness. Also it will be a start point and lesson for the creation of the place and network of play described above. It will generate a set of demands to create play that is truly public in nature and that has the intention of a change in the setup of the existing public space. Also the durability of their effects will be judged to get a sense of what a sustainable network of social-spatial play may look like.

3.3 Design and public play processes

What elements of designing are compatible with public play processes?

How have design methodologies used play until now?

The role of imagination in design

As was suggested in the previous chapter, in order to make play enjoyable on the long run and repetitively, it needs to obtain a balance of challenge and skills. This becomes an important consideration for the creation of a public play to ensure the participation of all. Also suggested, that if newness is introduced in play, this is a new balance that gets added to pertain the joy of play. Methods for obtaining newness mentioned there were: the limitless imagination and expansion of imagination by the imagination of others. Since design operated on the field of imagining a future that does not yet exist with the intention to render imagination to physical reality, the imagination in design can be an example of a method to create public play. This asks for a brief closer investigation of design: how do we intervene in the future with design, what role does imagination have in this process and how could the public be part of this process?

Human conceptions of realities, separated in terms of their desirability and likeliness to become reality, demonstrate different ways of approaching contingencies in the future and present (as presented in fig.37). De Jong elaborates further on this (the model of fig. 37 originates from him as well) by describing some of the current human activities in domains: possible is the domain of design, the probable the domain of prediction and the desirable the domain of governing. Designing is an activity that concerns experiments and propositions, that have not been made probable yet and might not be desirable either (De Jong, 1992). In different design phases, the design navigates from the field of the possible gradually and with iteration towards the reality. Not all skills that are used in this process of “thought and action for solving problems and imagining new futures” (Folkmann, 2013), I propose, are exclusive to designers. In fact, it is this initial stage of the design process revolving around the imagining of a possible future, which is ultimately accessible for all participants of the public. For as “The full variety of play forms only appears with the achievement of a certain maturity” (Mouledoux, 1977), it is *imagination* that stays with us from the very beginning of our lives: “To recognize yet disregard the invisible boundaries of the cityscape – this is the desire of the child and the regret of the adult.”, also: “Playfulness and dreaming are part enchantment and disenchantment of the adult world” (W. Benjamin quoted by (Gilloch, 1996)).

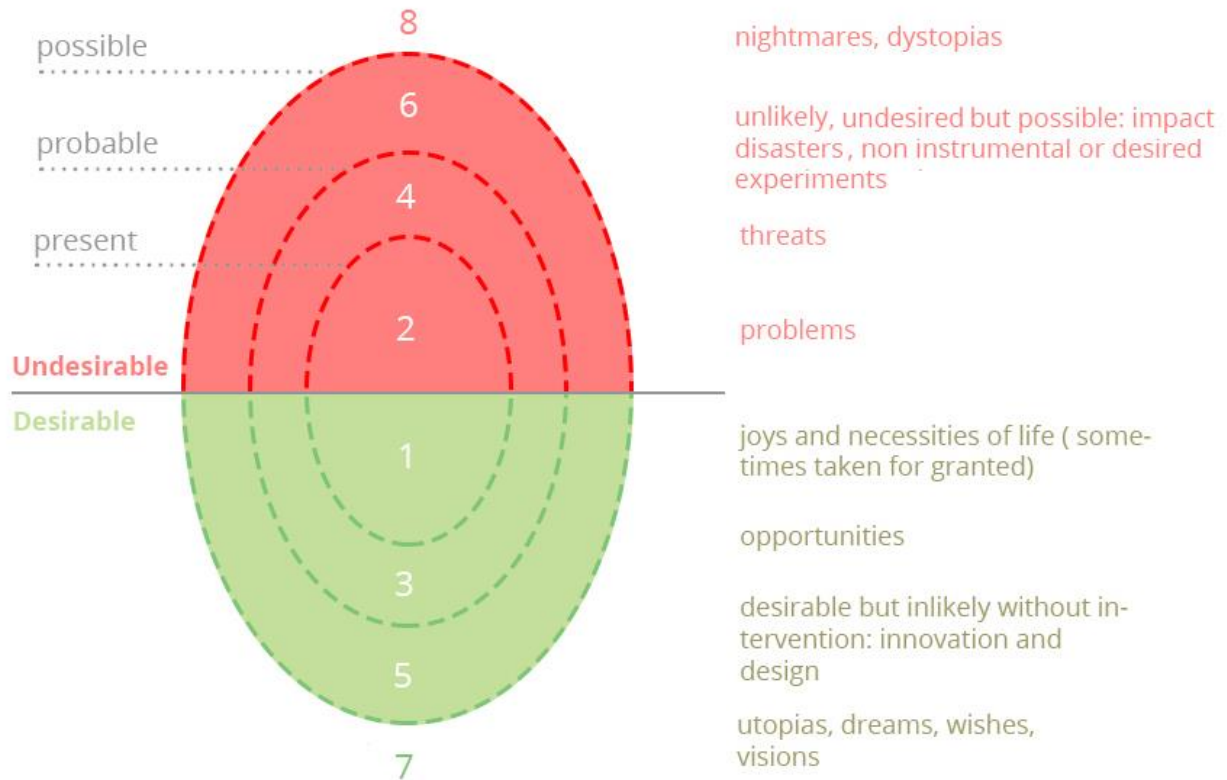


Figure 37 Realities as humans conceive them, separated by desirability and likeliness to become reality (own illustration based on (Van der Berg & Ganzevoort, 2014)).

It is imagination we all possess; only the tools of expression of these (and expertise in them) might be different for the layman and a designer. As there are no set tools for proper public imagination, I will evaluate existing cases that operate under the same conditions of the selected locality. A critical evaluation of the tools and methodology of imagination play towards parameters of the level of publicness of these (inclusion and participation of great variety of people) and level of engagement (lasting effect of the play for further own initiative by participants), will inform considerations for public imagination processes in the selected locality.

Play as a method of participation of non-designers in exploratory design processes

The interest in improving conditions based on human experiences falls in the broad category of human centered design. The consideration of humans that are related to the object of design has been growing over the past seven decades and has shaped several approaches of involvement of people in design. These are visible in the diagram of the current human centered design landscape by Sanders and Stappers in fig 38. It is since the 1970's that instead of a passive influence on design as subject of study (in user-centered design), people were allowed to play a more active role in the design process via the tools and ideas that were developed in what is called Participatory Design. This shift in interest can be explained according to Sanders as traditional design practice driven by a (end)product perspective goes towards a purpose perspective mostly present this day as design thinking has expanded its reach

towards experiences and comprises new categories of non-physical things (for instance service or interface design) (Sanders & Stappers, 2008).

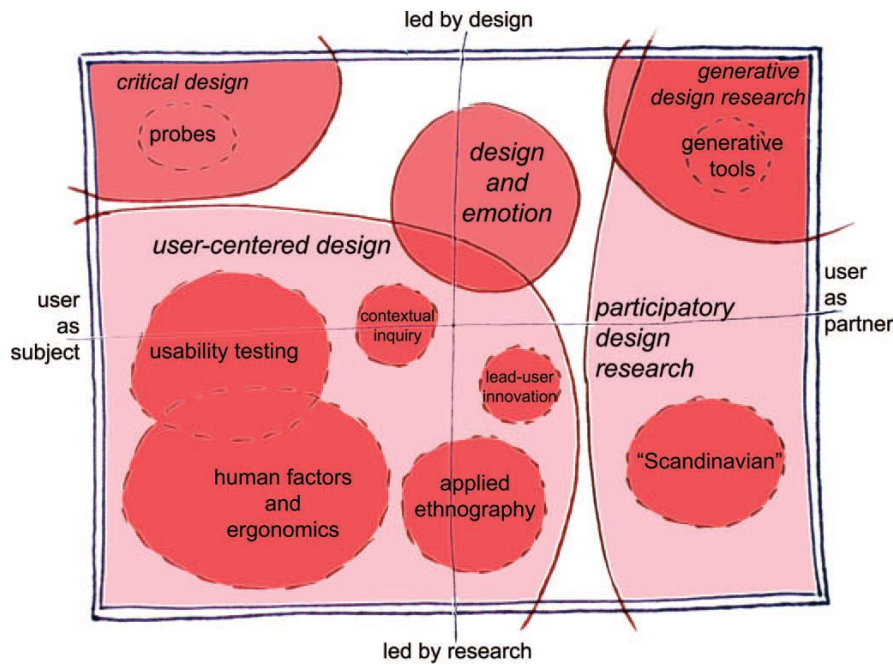


Figure 38 Current landscape of human centered design research (Sanders & Stappers, 2008).

A framework that explores the different tools and techniques for participation of non-designers for different purposes within a design process is presented by Sanders, Brandt and Binder in fig. 39. This framework categorizes the tools and techniques of participation by their form (the actions involved: making, telling, enacting) and reflects these towards their purpose (probing, priming, understanding and generating). Besides this, the tools are also reflected towards their applicability for individuals or groups and face-to-face or on-line presence (fig. 40). Other than these considerations these authors add that the venue (advantages and disadvantages for both researcher and other participants) and the relationship of the stakeholders (variety of perspectives among them, incentives for participation, time effort and attention available) are vital in the design of successful participatory processes. They suggest tools are preferably used in combination with each other, where successful examples have used the order of telling to establish the stage and information for enacting activities like scenario plays, followed by making props of future design artifacts that can inspire new scenario creation sessions in an iterative manner (Sanders, et al., 2010).

TOOLS AND TECHNIQUES	PROBE	PRIME	UNDERSTAND	GENERATE
MAKING TANGIBLE THINGS				
2-D collages using visual and verbal triggers on backgrounds with timelines, circles, etc.	X	X	X	X
2-D mappings using visual and verbal components on patterned backgrounds		X	X	X
3-D mock-ups using e.g. foam, clay, Legos or Velcro-modeling			X	X
TALKING, TELLING AND EXPLAINING				
Diaries and daily logs through writing, drawing, blogs, photos, video, etc.	X	X	X	
Cards to organize, categorize and prioritize ideas. The cards may contain video snippets, incidents, signs, traces, moments, photos, domains, technologies, templates and <i>what if</i> provocations.			X	X
ACTING, ENACTING AND PLAYING				
Game boards and game pieces and rules for playing		X	X	X
Props and black boxes			X	X
Participatory envisioning and enactment by setting users in future situations				X
Improvisation				X
Acting out, skits and play acting			X	X

Figure 39 Tools and techniques of PD organized by form and purpose (Sanders, et al., 2010).

CURRENT APPLICATIONS OF THE TOOLS AND TECHNIQUES	INDIVIDUAL	GROUP	FACE-TO-FACE	ON-LINE
MAKING TANGIBLE THINGS				
2-D collages using visual and verbal triggers on backgrounds with timelines, circles, etc.	X	X	X	X
2-D mappings using visual and verbal components on patterned backgrounds	X	X	X	
3-D mock-ups using foam, clay, Legos or Velcro-modeling	X	X	X	
TALKING, TELLING AND EXPLAINING				
Stories and storyboarding through writing, drawing, blogs, wikis, photos, video, etc.	X	X	X	X
Diaries and daily logs through writing, drawing, blogs, photos, video, etc.	X		X	X
Cards to organize, categorize and prioritize ideas. The cards may contain video snippets, incidents, signs, traces, moments, photos, domains, technologies, templates and <i>what if</i> provocations.	X	X	X	
ACTING, ENACTING AND PLAYING				
Game boards and game pieces and rules for playing	X	X	X	
Props and black boxes	X	X	X	
Participatory envisioning and enactment by setting users in future situations	X	X	X	
Improvisation	X	X	X	

Figure 40 Current application of the tools and techniques of PD described by context (Sanders, et al., 2010).

Within the field of participatory design it is in processes of co-creation – collective creative acts- in the design process that besides users being recognized as ‘experts of their own experiences’ (Sleeswijk Visser, et al., 2005) and the other stakeholders’ knowledge is considered as well, their creative abilities are recognized, enhanced and encouraged. The generative powers of all participants applied in collaborative, collective processes have shown not to improve the design outcome only. These processes have as additional or maybe even primary effects that they bring about emancipation, ownership, generate shared knowledge, understanding and agreement (among others in (Brodersen, et al., 2008) (Brandt & Grunnet, 2000) (Mattelmäki, 2008)).The term ‘co-design’ is used then to indicate acts of co-creation taking place during the whole design process.

It is debated whether a full co-design process is possible or even desirable to come to the actual creation of a design. To create an effective process, the moments and purposes of participation of non-designers in the design process should be contemplated. A diagram in fig. 41 shows simplified what design processes look like. It is suggested as early as 1972 that when accepting the people as expert in their experiences and as creative beings, the users can have a big influence on moments of decision in design processes, but also at the idea generation phase (Cross, 1972). The moments in this process that future users can be valuable for participation in the design process are underlined in the diagram. In fact it is especially in this divergating phase at the very start of a design process with its open, ill-defined and complex questions that the involvement of future users is helpful to create knowledge that is useful for the rest of the design process. The further involvement of potential users and experts in some of the other stages of the design process is not so much required for the effectiveness of it, but still can be a good idea to sustain group dynamics and an atmosphere of involvement and non-hierarchy.

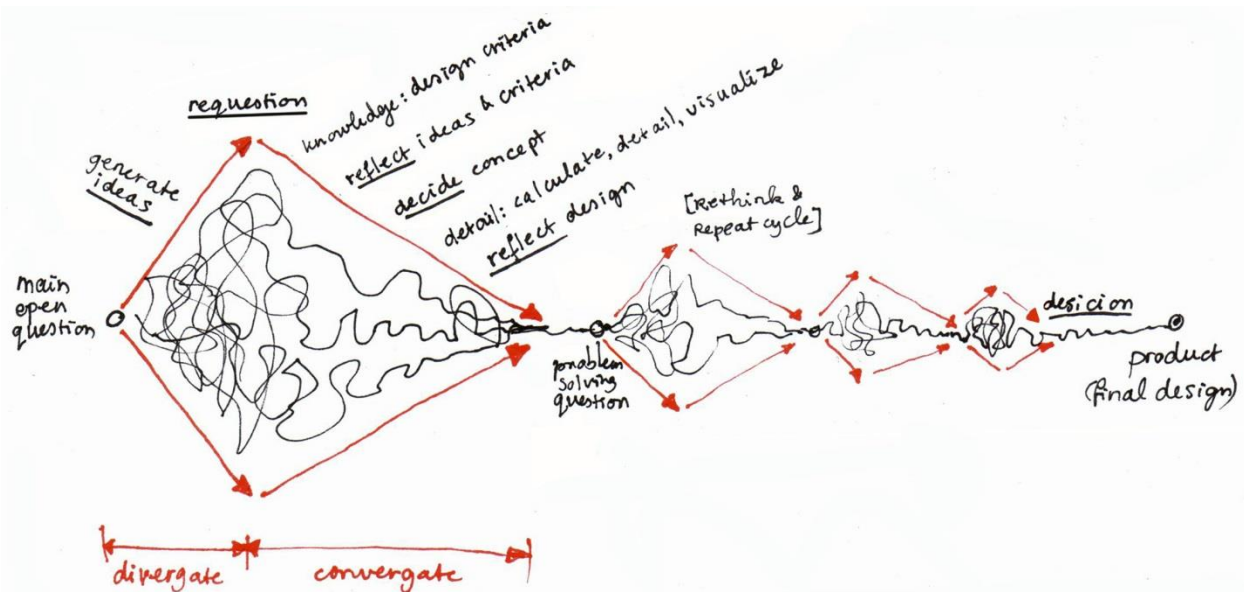


Figure 41 The design process with participation stages for non-designers underlined (own ill.).

The success of any form of participation is very much dependent on the application and design of the tools and the process as a whole. Besides the considerations already mentioned earlier about tools and techniques, Sanders and Stappers suggest that special thought should go to the former ‘user’ to become

a co-designer. The observations of the interviews led me to the conclusion that all of us have the ability to imagine and play (essential skills for idea generation), but not all of the participants were equally able to in the same fields of imagination. Sander and Stappers subscribe this and explain that the ability of the non-design expert to do generative design activities (to create) also depends on their 'level of expertise, interest/passion and creativity' (Sanders & Stappers, 2008). In order to establish an appropriate approach for participation in accordance with these variants per participant, Sanders ea. differentiate four levels of creativity: doing, adapting, making, creating (see also fig 42). Note the importance of this notion for the variety of people that are present in the public. The higher on this scale of creativity, the more useful the outcome.

Level	Type	Motivated by	Purpose	Example
4	Creating	Inspiration	'express my creativity'	Dreaming up a new dish
3	Making	Asserting my ability or skill	'make with my own hands'	Cooking with a recipe
2	Adapting	Appropriation	'make things my own'	Embellishing a ready-made meal
1	Doing	Productivity	'getting something done'	Organising my herbs and spices

Figure 42 Levels of creativity (Sanders & Stappers, 2008).

This giving out of hands some of the activities that were solely reserved to designers in traditional design processes and the potential disabilities (lower levels of creativity) of the participants to perform these creative acts to produce a desired outcome, demand the designer or design researcher to take on a new role. Instead of being a translator of experiences of users received through documents and observation, the design researcher should become a facilitator of people's expression at all of their levels of creativity. In accordance with these levels, it is suggested for design researchers to: 1) lead those at 'doing' level 2) guide those at 'adapting' level 3) provide scaffolds for those at 'making' level and 4) offer a clean slate for those at 'creating' level (Sanders & Stappers, 2008).

So how exactly can one create an atmosphere where a big group of changing people with different creative skills, interest in the case and available time can generate ideas together that relate to a specific open question? The traditional prototyping theory described by Ehn makes use of a relation between *tradition* and *transcendence* to generate a mode of creation in participatory processes (Ehn, 1993). This is often applied in props and for enacting (with the purpose to understand and generate not only as the self but as a future user of something new): well-known objects are presented in a unconventional context, which causes imagination to go beyond the physical present reality, but still stay within the known concept and structures that are presented. In addition Brodersen ea. suggest instead of using known objects for scrutiny as the point of departure and the transcendence being based on the lack of conventional context, by making the objects or the surrounding that are intended to evoke creative reactions (elements of transcendence) radically distant (in for instance time and location), a widening of the participants perspective takes place and like that a more open and exploratory design space is created (Brodersen, et al., 2008). The theory of transcendence and tradition also applies to the participatory method of play or games. In these often abstractions (like cards or a limited playfield and rules) create simulated randomness; indicating participants need to open up to the world of imagination which defers from reality. Abstractions furthermore stimulate a state of ambiguity that leaves space for

interpretations and imagination to flow into endless directions evoking new design possibilities (Brandt). So elements of transcendence of reality in the participatory design process that evoke creativity can constitute of abstractions, change of context of the elements of tradition or taking elements of transcendence from the unknown to all. In my own research, I have observed that there are certain objects and situations that trigger the imagination naturally in accordance with the own skills and frame of reference of the interviewee. As I proposed earlier, it is memories, associations and imagination of the interviewees themselves combined with imaginative observations– that can shape up shared elements of transcendence for collaborative play processes. Once this shared body of unknown elements (the inspiration) is presented to them, the imagination of the participants themselves can provide for the newness which has been proven vital for the sustenance of play. By doing so, the play experience becomes a collaborative one. It is in staging the set for enacting and by designing the rules and play elements that the direction of the creative effort can be set towards the design task. That is the tradition, the known or presented elements to play with. In my case this would be to apply the imaginative effort towards the (physically fixed) setting of the location.

3.4 The application of play in design processes to revitalize public space

How do cases use play in their design process to revitalize underused public space?

In the review on participatory approaches, I have identified some challenges that are inherent to making non-designers participate in a design process. Also the benefits were shown of playful collaborative approaches especially for processes where new possibilities should be explored and a variety of participants are present (the public). Methods to deal with the challenges of making non-designers co-explore and create were also presented.

A few cases that have a similar design task and apply participatory approaches will be reviewed to assert their effectiveness and to establish if the playful element in them is indeed beneficial for public processes. These similarities are:

- Task: coming up with potential uses of underused public spaces
- Intended effect: creating an awareness and connectedness of people to these places and each other
- Method: by participation of the public in various forms and stages of the project

The cases all aim for public engagement for the activating of an underused area using playful methods with the purpose of making people aware of the existing space and or to intervene. The cases are:

- *Dream Hamar*, redesigning an underused public square in Hamar (Norway), curated by Ecosystema Urbano.
- *Kotachiwadi Imaginaries*, inspiring and activating locals for preservation through transformation of their endangered neighborhood in Mumbai (India), curated by URBZ.
- *De Achterstraat*, stimulating interaction with the street and the stories of others that go unheard in Dordrecht (Netherlands), by Recycle-X project group of the V2_Lab (Institute for Unstable Media).

After describing their specific context, aim and methodology, the type of participations will be discussed and depicted in the phases of the whole processes of the project. Lastly the results will be reflected in terms of design (did it produce enough ideas that related to the design task, did it produce designs that reflected the people's opinions), social and spatial connections that are established (what type of connections) and how durable is the effect of the event (all the three dimensions).

The reviews of these cases are all based on publications and reports by the designing parties themselves.

3.4.1 *Dream Hamar*

Context and aim

Dream Hamar is a network of efforts set up and executed between September and December 2011 originally to generate a design for the small Stortorget square in Hamar, Norway, which was at that time solely used as a parkinglot. The curator of the processes was Ecosystema Urbano. In this project they organized systems and tools for participation in four 'Labs': a 'Physical Lab' for onsite presence and representation (a place to "listen and listen to"), 'Urban Actions' where public events take place aimed at experiencing and testing took place at real scale, an 'Academic Network' connected to diverse European universities to help in the design and ultimately a 'Digital Lab' where online communication and contributions could be made.

The overall purpose of all these activities and networks was to "stimulate public debate and generate new ideas" by "connecting local citizens to professional and academic networks worldwide". Their methodology in their own words creates "resilient and proactive communities" and "more inclusive and meaningful designs" (Ecosystema Urbano, 2012). To achieve this, they make use of participation and networking.

Participations

As becomes clear from the organization of their participation into four lines as well as the network methodology, *Dream Hamar* makes uses of different streams of contributors and contributions to generate ideas for the square. The contributors could be categorized as either local visitors on site ('the public' as I would call them), local groups that either joined voluntarily or were asked to join (for instance local artists and other groups to create workshops), local organizations (Cultural Education for schools, where schoolkids participated mandatory) and external enthusiasts (voluntarily) or organizations (university students that made designs in the context of an elective course for credits). The contributions that could be made during the project Ecosystema Urbano envisions as a pyramid of participation ranging from more passive forms of participation at the bottom and more active forms at the top (where they stand in the role of curators), see fig. 85.

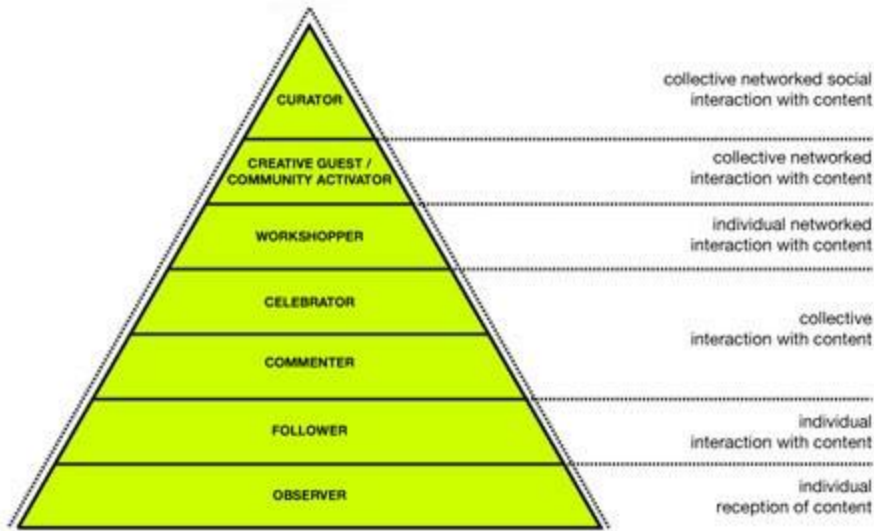


Figure 43 Ways of participating in Dream Hamar envisioned like a pyramid of actions (form passive to active on the top) (Ecosystema Urbano, 2012).

The structure of participating actors and their purpose in the design process of Dream Hamar could be envisioned as depicted in fig. 86. Here we see that Ecosystema Urbano has prepared the process by creating a preliminary design through urban analysis and designing the structure of the participatory and networking processes. In accordance with certain themes that they have concluded are relevant, during 4 months people can share their ideas and contribute. Along the four lines there are different ways in which can be contributed. The roles of these four Labs in terms of participation: physical lab is a place where the public can be informed and where during discussion and workshops ideas can be shared verbally which will be noted and exhibited. Digital lab is also meant for informing the public and has a limited option to express ideas for the public (again in the format of text). The academic network produces complete design propositions also in accordance with the themes. The urban actions bring people together in creative and original ways on the location and this often brings about side-discussions and ideas for the future use of the square by the visitors. As the structure of the tools was mostly solely allowing for verbal or textual expression by locals, the ideas during sessions were often depicted and summarized as word clouds and must have been noted somewhere in a more elaborate way also. The whole set of ideas by locals, local groups and external groups and individuals were put together and revised in order to start the synthesis phase of designing by Ecosystema Urbano.

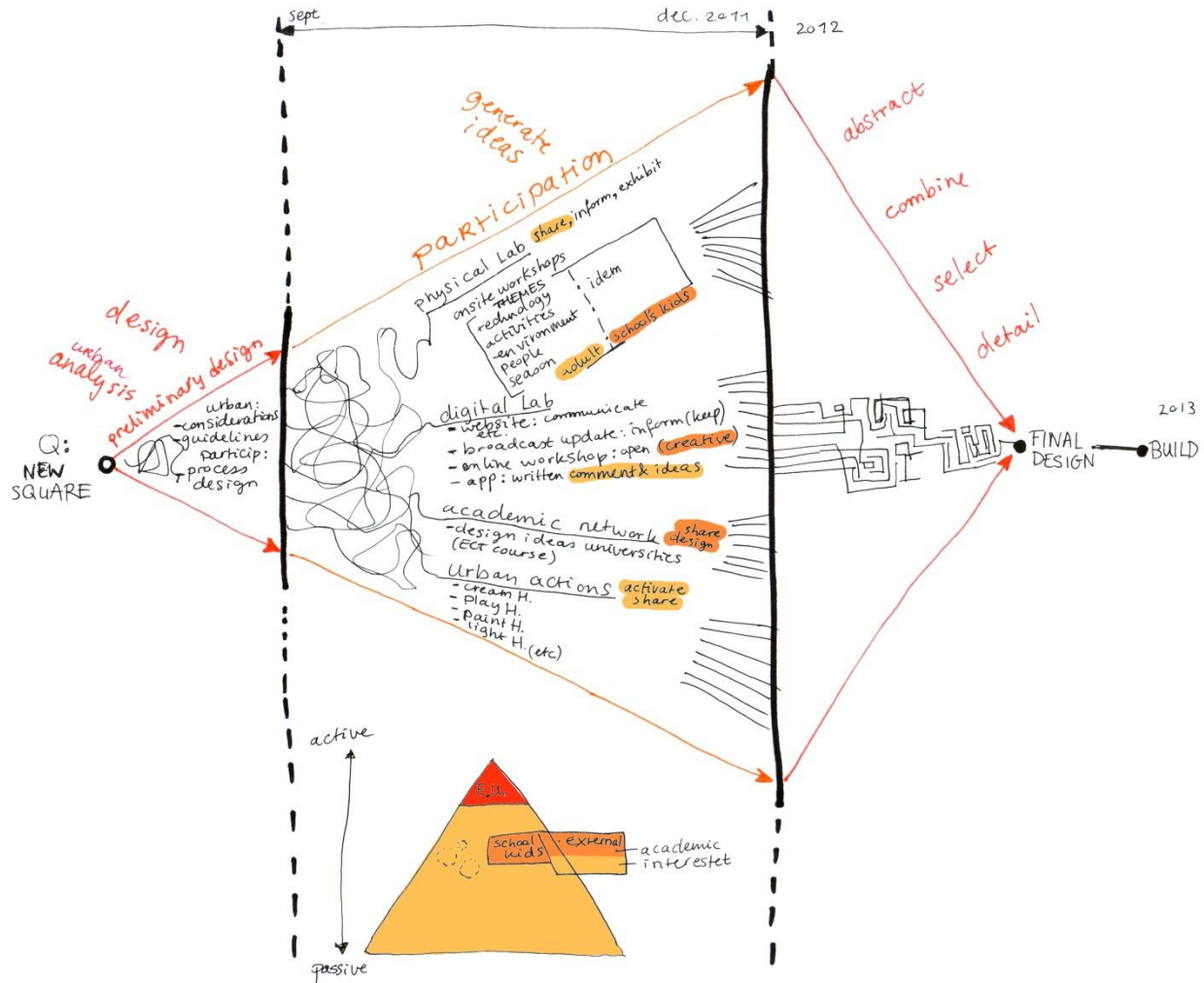


Figure 44 The process and actors in it. Red are the designers, orange is the local public. Dark orange are external groups or individuals (own ill.).

Results – Design, social and spatial connections, long-term effects

All the activities on the square – presence in the building bordering the square, participatory processes, the actions and the physical changes made during the 4 months - all aimed at establishing an awareness of first a place that was previously uninteresting (parking lot), second of the potentials of these for multiple social and public uses and by doing so put those that feel a raised curiosity and interest to contribute in the sharing of perspectives and ideas for the future of the square. Although according to the blogposts and videos an image can be established that the activities organized were quite well visited, it is hard to establish an idea of the effects of the participation on the design (not enough information on the participation contributions and the process of synthesizing by EU). As all activities are social, the social effects of the activities can be guessed. It is especially in the Urban Actions that a peaceful and non-hostile atmosphere and activities of collaboration are created that can be good ice-breakers for social interaction. Activities that set such a stage for encounter of the other that Dream Hamar produced are for instance a lunch on a table with strangers, singing Christmas carols.

Connections to the place itself were obviously made as all activities took place on or right next to the space. The urban actions that took place on the square served as inspirations of what could be done to vitalize a square in Hamar and are therefore have a good role in the memories of people of the space. Unfortunately there where only a few activities where people could make a short-term ownership relation towards the future space (kids on schools made mockups of their dreams, few benches were made by an existing group to be places on the square). Overall I conclude that the social and spatial connections could have been more and last longer if the participation did not restrict itself to the ideas generation phase and if the methods applied made the participants more creative. Examples have been made in the review of participatory processes about transcendence, enacting and making in this respect.

The statement of Ecosystema Urbano that their methodology creates “resilient and proactive communities” and “more inclusive and meaningful designs” then, could be asserted as partially true. With the information available I would deem it more true that Dream Hamar created ‘active communities’ and hopefully a more inclusive and meaningful design.



Figure 45 Cream Hamar - urban action to serve a local lunch including fresh milk from a cow present at the spot (Ecosystema Urbano, 2012).

3.4.2 *Khotachiwadi Imaginaries*

Context and aim

Khotachiwadi Imaginaries is a 4 day event that took place in January 2016 to activate the local community of the originally East Indian Christian Village of Khotachiwadi in Mumbai (India). The events were organized by the architecture and urbanism firm URBZ that works in Mumbai and has a long standing relation with the neighborhood Khotachiwadi as “anthropologists, educators, activists, urban designers and residents” (Columbia University, 2017). The structure of the event was Day1: Observations and Discussion, Day2: Review of Designs, D3: Workshop and Day4: Presentation. These all took place in locations throughout the whole neighborhood.

The aim of the event was to make the local community aware of the opportunities of “preservation through transformation” of their dilapidating heritage (old decorated wooden structures) in the verge of the surrounding Mumbai that marks their original village with its low-rise but dense urban structure and diverse communities as “urban slum” and is more than happy to make expensive high-rise on this location (URBZ, 2016). Besides showing them potentials that would improve the neighborhood for its users, the approach of ‘preservation through transformation’ as suggested by URBZ for Khotachiwadi includes interventions that would give the local community more feet to stand against the eating city of Mumbai by improving their maintenance and increasing value for visitors (which there are already many of) and organizing them (trying to bring them together in a Trust).

Participations

As Khotachiwadi Imaginaries was a short event with the outcome not aimed primary at a specific design, but more to activate the public, the process is different from Dream Hamar. In this process it were creative volunteers that did most of the design tasks (research, reflect, imagine, design). Participation of the locals was limited to them being the input of observations (including sometimes talking with locals) in this stage. More active roles for non-designers on the location were in a few workshops and being a consumer of the imagined on the last day of presentation (watching the drawings or interacting with the interventions that were already executed on site). Local businesses and knowledge was addressed in the organization of the workshops where also in one case local kids participated (making stencils and painting cats in narrow alleys). All the different participations of Khotachiwadi Imaginaries are marked in the process drawing of fig. 91.

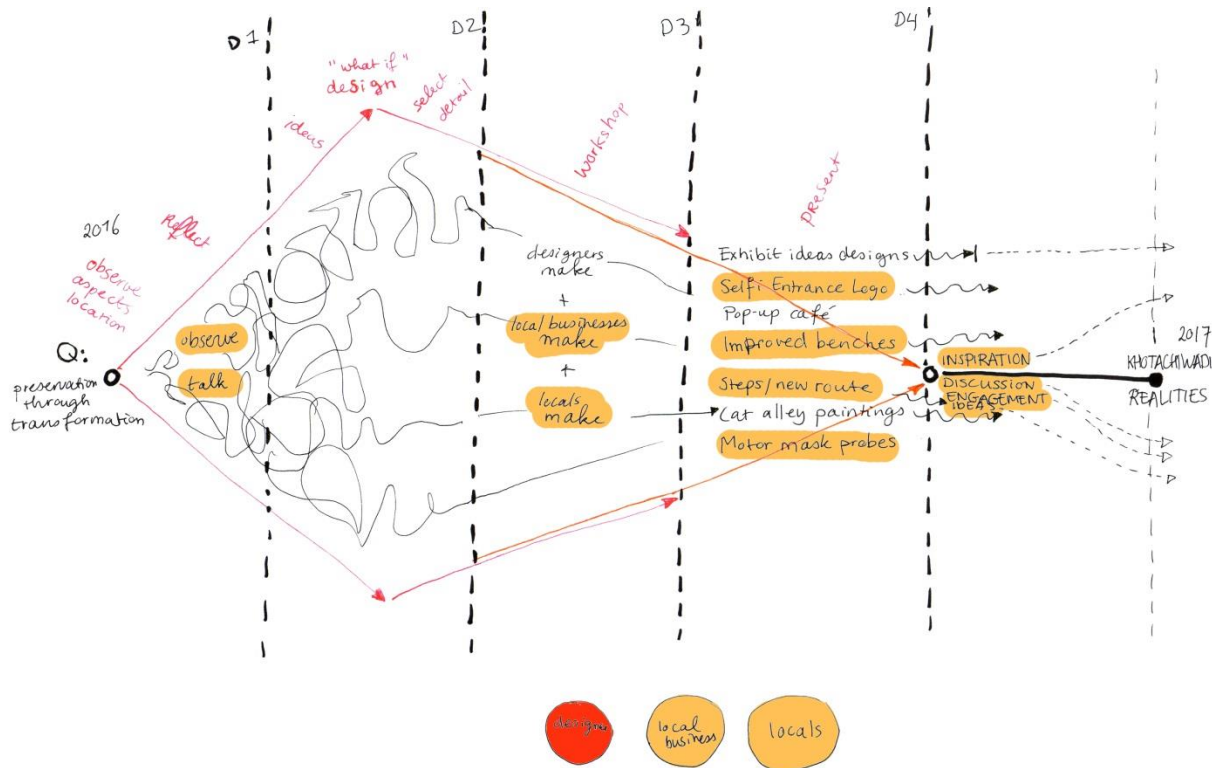


Figure 49 The process of Khotachiwadi Imaginaries (own ill.).

Results – Design, social and spatial connections, long-term effects

The designs presented at the end of the 4 days were a result of the creative interpretations of aspects of the environment of the neighborhood by the creatives that participated in the event (most were from outside the local community, but at least one was from Khotachiwadi itself). In this case the participation in design was limited to observation. The designs, intended to inspire the local community and bring the topic to their attention, were presented as a surprise by the time of the exhibition and as such maybe do not serve as designs to be executed (directly). They did raise attraction, as the exhibition was asked to stay up a tad longer by the locals. Directed mostly at social and spatial connection, the organization notes that the presentation day gave rise to a lot of people gathering. Some of the people that gathered appeared to be neighbors that had never met before although had have been living next to each other for years (URBZ, 2016). Motor masks with different characters that mostly young bikers picked up to enact scenarios of the streets were also a successful project that opened up conversations among locals about directions of improvement in a playful manner. Through these notes it can be concluded that most probably the events did produce the social interaction that they were aiming for. Through the useful, recognizable and remarkable objects produced during the workshops placed on the locations, clearly an awareness of place and potentials of place was created as well. By showing that small interventions like painting and placing recognizable beautiful elements (nameplate), could significantly change the look of the environment and attract positive behavior (the selfie nameplate that has a high pictorial value and can attracts tourists). After the 4-day intervention a follow up event named Khotachiwadi Realities is planned in 2017. No information could be found on activities or action

happening in the area after the event so far. Thus we can only speculate about the effects of this event on the long term: by leaving behind some physical memories of the event in the form of decorative or usefull objects, the memories of the local community around the effects of transformations can potentially stay fresh. The interaction with the products of the workshop that were temporary still has potential to leave behind a positive memory (using surprise and allowing for play). As such KI can be seen much more like a spark for community creation and activation, a spark which has proven to keep a small fire going as a promise for a re-ignition and long term fire in 2017.



Figure 50 Workshop preparations (URBZ, 2016).



Figure 51 Logo design by entrance saying "Khotachiwadi" (URBZ, 2016).



Figure 52 Pop-up coffee spot together with bench with designed additions (URBZ, 2016).



Figure 53 Motor story masks (URBZ, 2016).



Figure 54 Cat painting and cross-over bridge (URBZ, 2016). Figure 55 Exhibition wall (URBZ, 2016).

3.4.3 *De Achterstraat*

Context and aim

De Achterstraat is an interactive installation in de Voorstraat in Dordrecht (the Netherlands) that was exhibited during the Urban Explorers Festival in 2010. The installation is designed by the team of Recycle-X of V2_Institute of Unstable Media. The installation constitutes of ears equipped with microphones that can record sound produced on the street, spread throughout de Voorstraat. The sound can be replayed by touching the spots of the sound on an embroidered cloth map of the street inside one of the houses on the Voorstraat. The design explores unconventional ways of engaging with your environment (through sound), but also with others (sound shared and produced by others).



Figure 56 The elements of the installation *De Achterstraat* (left: the microphones in the street; right: the interactive map of the street) (Nigten, 2010).

V2 developed a methodology that they refer to as ‘the Patching zone’: the patching of different know-hows and experiences in a transdisciplinary team combined with the involvement of stakeholders on set stages of the cycle of the project with set roles for them to fulfill. Their process with involvement and roles of stakeholders are visible in fig. 99. All their projects are characterized by a bottom up approach - interactions emerge in a ‘messy, non-structured, flexible way’ - and have a strong focus on social and cultural interaction (Nigten, 2010). In their projects they aim for the highest types of involvement, stating that “participation that could lead to co-ownership turns out to be one of the crucial ingredients for sustainable effects of our projects” (Nigten, 2010).

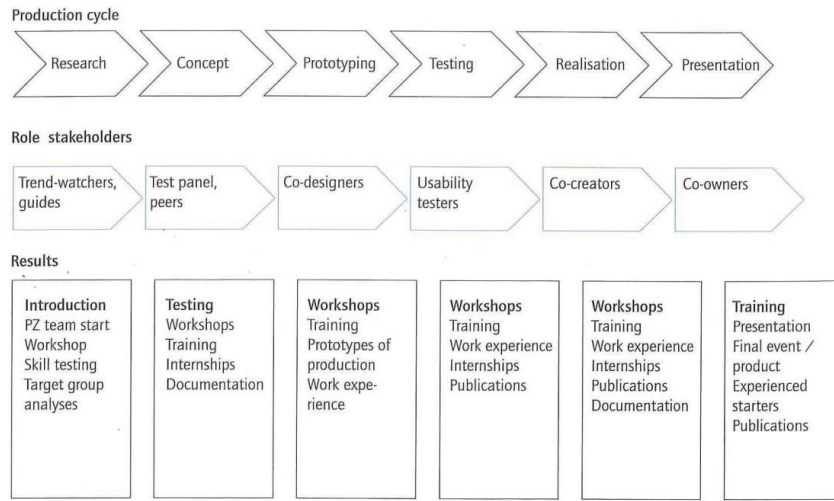


Figure 57 Process design of the Patching Zone (Nigten, 2010).

Participations

The design process of de Achterstraat was a trajectory mostly directed by the design team. As the team started with the open question of the festival to make an entry, they brainstormed about the topic of this festival (exploring) and connected this to the location where the project had to take place. This created a concept and design that was executed partly with their own expertise (technical and electronic devices and materials) and partially with that of a group of people from the city that responded to an advertisement (embroidery work against payment of a ticket) and a neighboring organization of skilled immigrant women (also for the embroidery). The last phase of participation was during the festival when the installation was in use. The anticipated surprise, play and encounter were observed. These phases of this project are depicted in fig. 100.

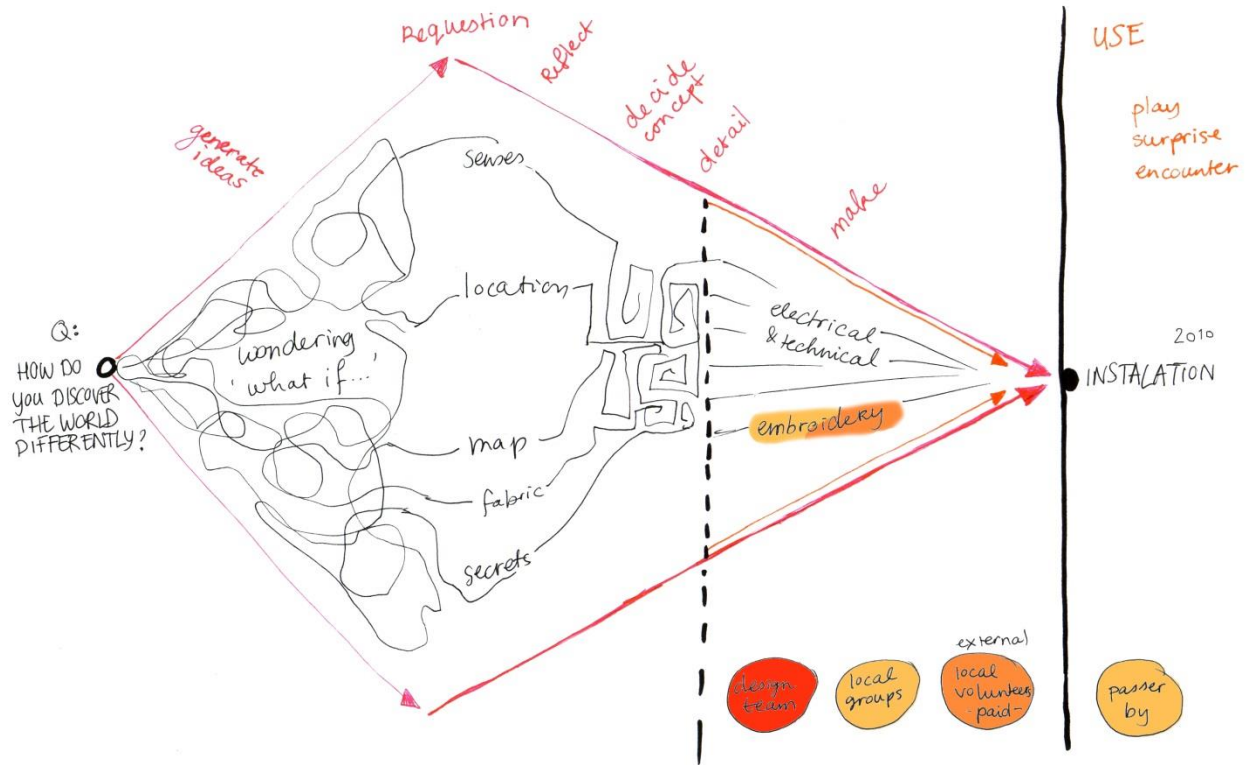


Figure 58 The process of De Achterstraat (own ill.).

Results – Design, social and spatial connections, long-term effects

Although the design concept was generated by the Recycle-X team, the involvement of local groups and individuals into the making phase, was a conscious choice. By leaving enough space to make the activity and result their own for the participants that were involved in the making process (giving them a base drawing and limited colors of thread but no directions on the way they should do the work), many of these makers that came by on the festival felt pride to see ‘their’ joint work in action. The feeling of ownership due to the making activity was coupled with a community feeling that was created during this process where people that often did not know each other were joined conversed openly while doing something they enjoyed and shared with the others. So the openness incorporated in the act of making combined with the group of diverse people that performed this, created a design that was not only the representation of the Recycle-X team. Also this act created social bonds. On the phase of use of this project, it is noted that like designed, people were surprised by the hidden features of the installation that they had discovered. The strangeness of the objects and the embroidered map, generated a state of curiosity and exploration where they met other users of the



Figure 59 A lady at work making the embroidered map of the Voorstraat (Nigten, 2010).

street. The surprise, encounter and play with the environment are likely to stay in the memory of the participants. For a while after the festival has ended, maybe some of the users will explore places with more open ears.

3.4.4 Conclusions

The three cases of participatory processes presented all had a different setup and ideology represented in their process matching with their intention. The first project, Dream Hamar, which intended to generate a design of a place that has been underused, used others in its process to explore this complex, open social- and design-question. The involvement was based on a pre-designed networking structure that due to its many lines produced a massive quantity of ideas for the design team (Ecosystema Urbano) to work with in the rest of their design process. The actual involvement of the public within this idea generation phase however, was limited to them telling their ideas about the square on the many occasions and events that were organized. The generating element of the process, that which inspires people to open up and share ideas, were either talks by experts or ludic surprising/new urban actions. The second project, Khotachiwadi Imaginaries, intended to bring the people of the neighborhood together and make them aware of the possibilities of preservation by transformation to give them a better position towards the threatening urban policy of Mumbai. Due to this inspirational intend, they only involved the public actively in the final results. These results had their own level of involvement and participation ranging from useful objects, facilities, decoration and objects of play. Specifically unifying elements were the playful engagement of the enacting with masks, the free coffee joint and the involvement of the local kids in the making process of graffiti. The involvement of people in idea generation phase of the designs was limited to a passive role (or slightly active) as subject of research (observation). The last project, De Achterstraat, wanted to broaden the perspectives of the users of the installation and bring them in contact with each other. Instead of aiming for involvement of people only as users of this installation, they also made the making phase a collaborative effort between different groups and individuals.

As my chosen location is one with no residents and almost solely visitors and possibly daily commuters, the aspects of participation which draws local passersby to participate are the most useful and inclusive methods to address public participation. In all these projects there were aspects that had the effect of 1) bringing strangers together 2) setting a different stage where these strangers could communicate 3) inspire people to think outside their own reality. These I consider elementary elements of collaborative public exploration acts. For an idea generative effect, people also have to be provided with the right tools to express themselves (in accordance with level of creativity) and the documentation of this expression becomes important to take the design into reality. The three phases of these collaborative public explorations explained:

- 1) We have seen in the cases that it is for instance free activities, strange and new setups (cow on the square, a new coffee spot on the corner), strange objects to interact with (installation, masks), making things together, that can provide a common ground for strangers.
- 2) By the fact that the event or object is something strange or unconventional, the public gets drawn to it. The second condition that one can or has to do something with the strange scene, evokes a common ground for conversation as all the participants are going through the same experience. Examples were

the urban actions (one event of exchange of old toys) and the discovery of the potentials of the strange installation in de Achterstraat. In the case of making things together, the going through the same experience is also what binds people together. In De Achterstraat the makers all had their own skills in the making activity already, which brought about a community feeling. In Khotachiwadi Imaginaries, the kids joined in making cat stencils and doing graffiti. For them this was a new activity that they had never done. The shared exploration of the unknown making activity became a bond-making factor there. This exploration of something totally new by all participants might have created an even stronger bond as all of the participants started off at the same level and new skills were developed in collaboration.

3) The element of surprise and newness in all these events created a setting that was unfamiliar to the people and as such interrupted their personal thinking mode. This was represented in the conversations and ideas that the events brought about. As these are not well documented in the available sources we cannot judge how effective they were at bringing about creative, unconventional and new ideas. As noted before also, this element relates much to the creative generative element. The projects at hand did not provide for mediums or tools to express these ideas otherwise.

It is in the tools and methods of participation that were discussed, that (2) and (3) dealt with elements that relate to the theory of transcendence and tradition: in providing an unfamiliar element, the daily reality of people gets disturbed, which evokes creativity. Different ways of doing this were observed in the cases: change of context of the elements of tradition (cow on square) and taking elements of transcendence from the unknown to all (what if buildings had ears and could hear your stories? what if motors are living characters?). Nigten refers to these elements of exchange as 'boundary objects': "a concept for exchange and communication where all participants can relate to" (Nigten, 2010). In other words: an activity that "allows for spontaneous transactional relationships between collaborating performers". These boundary objects create a kind of 'game-space' which works as a 'negotiation space' at the same time (Nigten, 2010). This explanation on its turn illustrates its close relation to play: triggering elements in contrast with the environment create a raised state of awareness and presence that is the perfect open and receptive state to engage freely with your surrounding including other humans.

Besides bringing people together and setting a stage of communication, I believe it is through play that a few advantages can be added to this process to make the stage more democratic and accessible (2) and to help in structuring the expression and documentation of ideas. The stage of (2) can be made more accessible to a public with its diverse skills and communal by setting it up as a common stage of equality: by setting certain rules in the play that everybody adheres to and by creating a setting with a total new experience where no one has pre-decided advantageous skills. This counts also for the designers that are present by this game. For the expression of ideas, the play can create mediums of expression in which everybody is equally apt, for instance a collective new making/expressing (like the cat stencils). Another way of using play for expression is by setting the expressions that people can choose between, in de form set cards per theme in for instance semi-structured games. In this way play can deal with the problem of diverse levels of creativity.

Throughout the cases another aspect of participation arose: the involvement of pre-existing groups for participation upon request and individuals or groups that pass by on the location (voluntary participation). Throughout these projects the advantages of involvement of both of these appeared to be a broader support (ownership), more publication and by this ultimately spread more awareness. An additional advantage was that one does not always have to depend on the uncertain amount of voluntary participants with unknown skills when working with pre-existing groups.

The results the cases on the long run were hard to judge. Overall it seems that either a long time involvement can be beneficiary for creating a feeling of awareness of the public and ownership over the result (Dream Hamar), or an explosive intervention that shakes up the minds of local communities (Khotachiwadi Imaginaries and De Achterstraat).

4 Discussion and Conclusion

I have put forth the suggestion that the public spaces within post WWII modern city structures are used for limited public purposes only, as represented in the example case of Rotterdam. Although the research could not prove this for the entirety of this area, there were places located that could be specified as such. In this report I have investigated the current public conditions of this part of the city and a specific underused public location, as well as ways of solving the problems for public use that arose in the research.

The public is a place of presence of the other, the unknown. The unknown aspect of the public can be experienced as a positive invitation for discovery or freedom. On the other hand it can result in uncertainty or even fear, which when these sentiments overrule can cause a lack of appropriation of space and encounter with the other. The cause of these two negative consequences of the public on the use of public space however also relate to what the city provides. In the case of the modern structure of the burned center of Rotterdam that arose after 1941, I have established the subsequent conditions of the public space: 1) As many areas have a designated nonfunctional purpose, the presence of a diverse public which is truly other is limited to intentional acts (going to places to be in certain realms). Mixing of functions only happens around main traffic arteries, which suggests encounter of others to happen only while passing. 2) A lot of open space compared to the old medieval pre-war structure. Most of this however is intended for traffic. The solely pedestrian accessible spaces that are left between these have either the shape of isolated islands or networks. Besides this, the city has lots of semi-public spaces (like shops and restaurants) and only few inside public spaces. 3) The morphology and materialization of the edges of the public space invite for either movement or staying. Most of which in this area are places of movement. 4) The elements in the public space are few and often positioned on seemingly random places that do not invite people to stay. Although there are quite some green elements, these are mostly applied as separation elements between traffic zones. There are only a few cases in this area where elements are positioned in such a way that they create the traditional typologies of the public space (square, park etc.).

The characteristic conditions of play were established as: 1) immersion in focus 2) contrast from ordinary 3) discovery and novelty 4) inclusive and accepting. It is exactly these characteristics of play that have the potential to become useful to tackle the uncertainties that arise in the public realm. Through these aspects a stage of trust can be build. When directed towards a re-design task of public space, engagement of the public with the public physical environment can be created. Design can be defined as the field of imagining possible futures. As the play of imagination between reality and fiction is a skill that we all poses, the design process of a future public space can be opened up and made more inclusive.

The actual experiences of a sample group were mapped and analyzed to establish the current values of the area. As a method to evoke these experiences, a tabula rasa map of the area was presented to them upon which they could project with all their diverse descriptive or drawing capacities whatever they remembered of these places. What arose were memories that relate to 1) seeing – examples show the observation of fragments and tracing in (and sometimes of) movement. Besides our movement, it is the

visual reach that helps us understand what we see. Scale of view is important here. Our mode of perception also tells a lot about what and how detailed we look at things. In this respect from convention, to intention to surprise we move toward a more active state of observation. The categories gave rise to the idea of designing for instances – that can change and differ every time – and for ever changing objects to create an environment that is appealing for public seeing. 2) doing – private, social and public acts were distinguished. The type of activities in the spaces seemed to be dependent on the proximity of people in space. Together with movement, this can bring about encounter. 3) feeling – mostly emotional connections to people (positive presence of people; negative behavior of people to the individual's perception). Also physical aspects of spaces had unanimous characteristics of good and bad 4) thinking – associations of locations with some internal knowledge. These were externalized as suggestions and fantasies. This demonstrated the diverse imaginative powers of the public, and the need to create a common ground for these differences to communicate in collaborative public processes. Besides raising a general understanding of ways of public perception and presence, all these categories gave indications of good and bad design for the public space of Rotterdam. More useful for design in this case however, were the places with no value at all. These places might benefit more from exploratory playful design processes than those which have a negative association (where a more problem-solving design approach can be applied). Such an undervalued location which had public potential was chosen as a location for redesign. A detailed sample observation showed the current uses of this location to be passage oriented on one side (no facilities for static activities for longer time), a place of peaceful detour with a view on the other side (with limited sitting facilities that were in sight of a big group of people) and at the intersections of these two limited vistas towards a square and towards the interior of the closed off empty building, actions of discovery were ignited.

The field of participatory design is governed by the idea to involve the former users of designs in other stages of the design process as participants. In allowing them to explore and generate ideas around a design topic, from solely users or subjects of research they become 'co-creators'. Opening up the design process for participation in such a way brings with it some challenges though. Most challenging in public participation where the participants are completely unknown is that as participants most likely are non-designers, their proficiency in generating ideas is likely to be diverse (or as established earlier: their ability to imagine depends on their limited personal frame of references). Their 'levels of creativity' should be taken in consideration when designing a participation process. As ways of triggering imagination and as a shared base of this imagination, design theory puts forth the presentation of elements of tradition combined with elements of transcendence. Elements of transcendence can be abstractions (for instance in games), known objects in a different context, or an element that is impossible to know (for instance life in 2050). It is in play activities that the exploration of the unknown within the limits of the rules of the play is explored ultimately. Three cases of explorations to bring underused public spaces under the attention of the public were reviewed. They all in different stages of the process had three elements to achieve involvement of the public: 1) bringing together – trigger and attraction was often something new or free 2) stage of communication – was an act that was performed simultaneously by the participants for instance doing or making something together 3) creative inspiration – something unconventional or new. I suggest improving the operational side of these elements to make them more suitable for public participation by designing these more consciously as

play. The rules of and elements and modes of expression of play can be the regulatory factors that brings the stage of communication (or creation) on an equal level by focus on a play where there are no experts (true exploration). Rules for self-expression can be integrated in these plays to achieve ownership sentiments over the result. This also corresponds with the existing levels of creativity within the public.

Applying play as an operating agent of active involvement for the public in improving existing underused public spaces implies a shift of perspective for the designer as well as the public itself. To implement the beneficial mechanics of public play for involvement, the designer will have to design the whole process to set new stages for the public (see fig. 60). Such a design process should start with an open question (aimed at exploring and not restricting outcomes). Subsequently the design research is intended to collect initial data of public experiences that can be used for the idea generation phase. For the idea generation phase a play experience is designed that properly evokes creativity by strangers and that gives space to personal expression of participants. During idea generation play the designer facilitates the play and provides all the help needed. The generated ideas are selected (with added concern for further participation in later stages), materialized, designed and represented. Those potential plans are improved in accordance with feedback of public. And lastly a collaborative making experience is designed by the designer (designer's new roles and responsibilities represented in red in fig. 60). This makes space for the public on their turn to become an inspiration for elements of the play and 'expert of his experiences' in the research phase, an idea generator and co-creator of imaginative public scenarios in idea generation phase, tester and expert of his experiences in the synthesis phase and co-designer and maker in the making phase (orange line represent public roles in fig. 60). As hopefully this process has brought about an improved relationship with the space as user and as owner, the whole process can start again iteratively by initiation of the public itself in set time-spans.

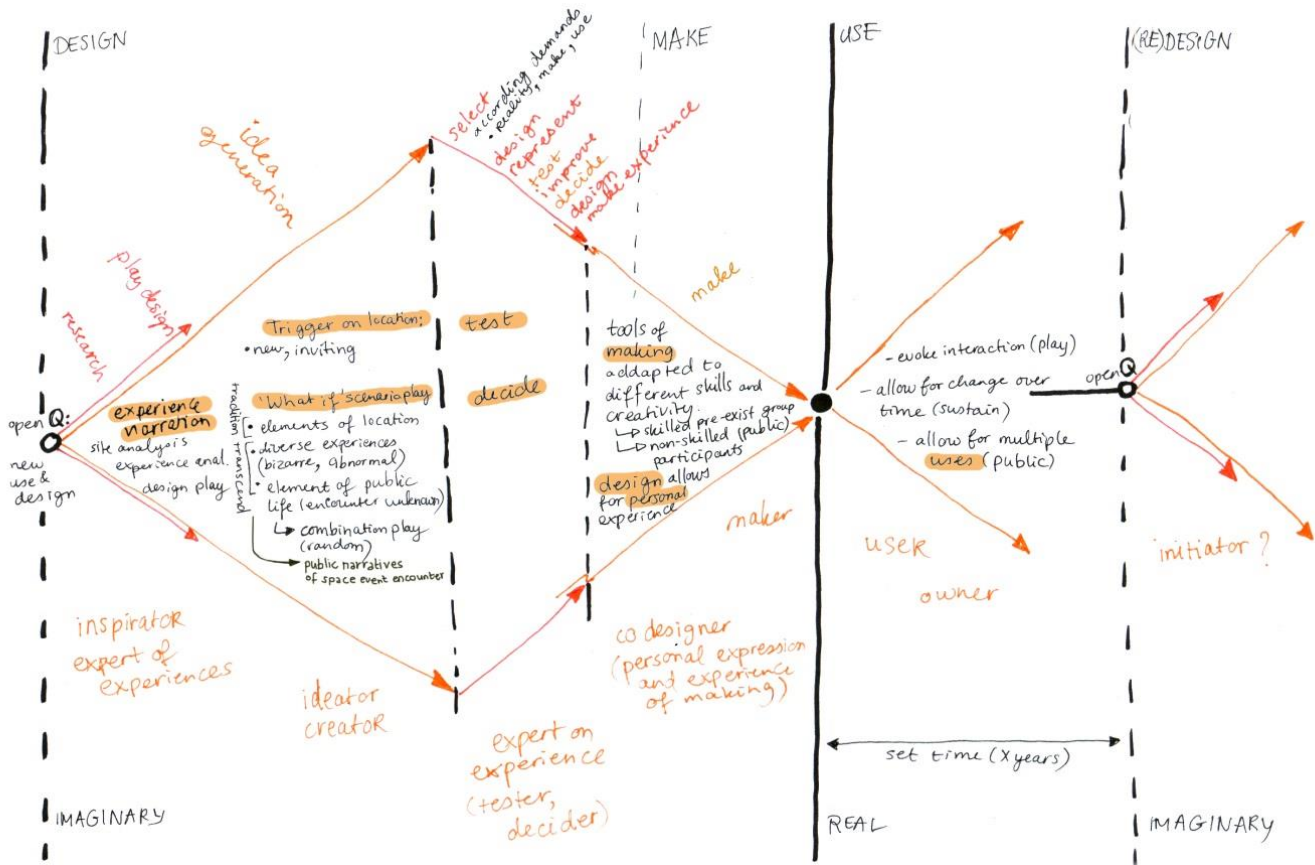


Figure 60 Proposed design process to involve public and create relations of ownership (own ill.).

The transit from this proposition of a playful public design process towards an actual one that can be implemented still needs some design work. For start the exact tools and elements of the imagination play for idea generation need to be specified in accordance with the chosen location and the means at hand. The trigger that makes people want to participate on the spot is adjusted to where the play takes place (inside or outside). The element of tradition corresponds with aspects of the design location to interact with, but in what way is this best represented (a model of the space or presence in the space itself)? The elements of transcendence on their turn correspond with the given stories of the previous correspondents of the play or with experiences that were narrated by people during research phase, and most probably include also extra external examples that can trigger imaginative thinking. Most probably a presentation of all these elements at the same time would overload the player. The introduction and order of these elements should be considered to make sure the player feels capable of playing. A very important challenge also lies in the way you achieve personal expression that increases the feeling of ownership in the idea generation phase. How do the narratives created by the public get expressed and who expresses them? Are the tools of expression adequate to convey the story created and which of these tools would be considered fun and comfortable to use for all participants? Besides these operative questions that need to be investigated before or while playing, the overall effectiveness of the proposed design methodology should be evaluated. This would ask for a specification of adequate

measurement tools of public ownership to be able to test if the methodology achieves this proposed effect.

This report has produced suggestions of improvements mostly for participation of the public in the idea generation phase of design with the theory of play. However, suggestions were made on the application of this theory and other modes of participation to create an enhanced sense of ownership over the result in other phases of the public creation process as well. A more thorough investigation of for instance the tools and methods of decision-making and making that can be used for public participation would be very useful to complement this study. Only when these are also thoroughly considered and tested within a complete process, can be concluded on the effectiveness of public participations for increasing an enhanced sense of ownership over the public space.

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Appendix A Population density in Rotterdam center

In the subsequent maps, you'll see current density of the neighbourhoods within the fire line and directly surrounding it (in amount of inhabitants/ha). Combined the second image of the buildings where these inhabitants are populated, shows neighborhoods surrounding the fire line are mostly residential, whereas the few people that do live in the center, are mostly concentrated in smaller footprints separate areas.

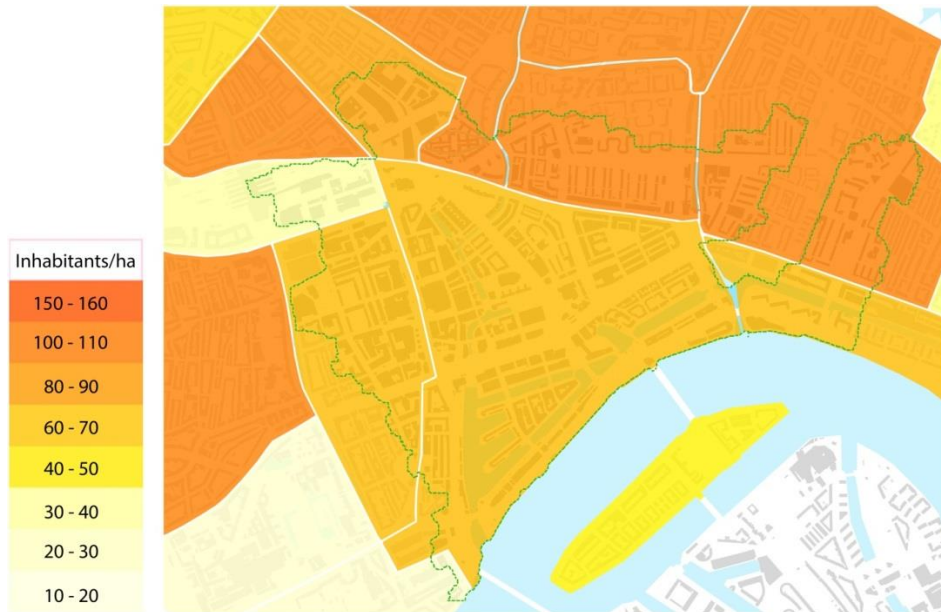


Figure 9 Inhabitants per neighborhood in Rotterdam based on population information from Buurtmonitor Rotterdam 2016 (own ill.).

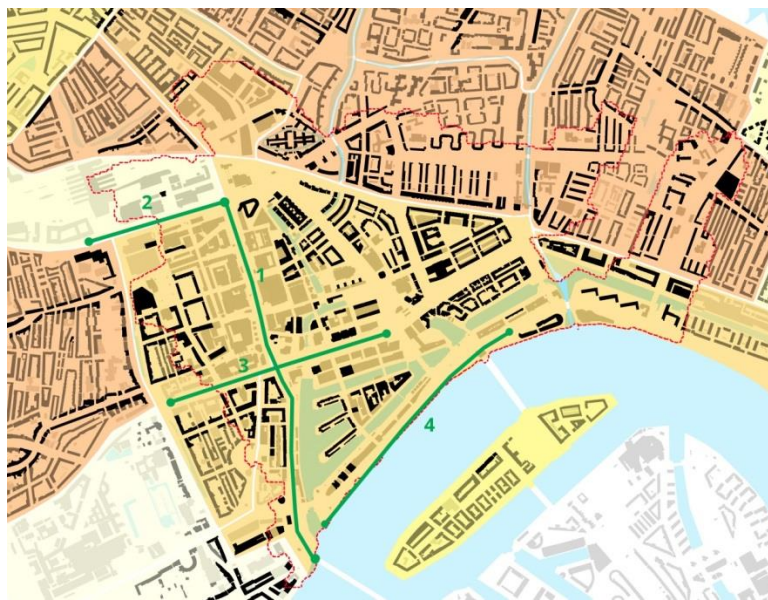


Figure 61 Residential buildings in black (own ill.). The axes show areas around main traffic lines that are deprived from houses altogether: Hofplein-Erasmusbrug (1), Weena (2), a big part of the Blaak (3) and the Maasboulevard (4). .

Appendix B Examples of public accessibility in the public space of Rotterdam

Zoomed into the center of the nolli map, all the categories of accessibility of spaces become visible:

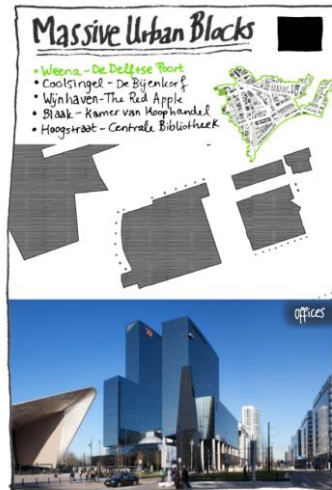


Figure 62 Sample of Nolli map of Rotterdam (own ill.).

The opened structure to the left is the old church (1), the one to the right the library (2). Above the church we can see a block (de Hofdame) with some semi-public spaces (shops and other retail services) (3), some private spaces for the residents of the block (4) and within it an open space which is not accessible to the public (5).

Appendix C Examples typologies of buildings shaping public space

Massive Urban Blocks – surrounded by roads and streets, form an obstacle to public movement. On ground floor level, we see that the blocks with more public interest (shops and on the route to stations) do something for the walking public (overhang for shelter, colonnade, see 1 and 2). In the growing city, these were originally only buildings with institutes (Chamber of Commerce, 5), shops (warehouses, De Bijenkorf, 3). Later on offices (2) and housing (4) emerged within this typology of mass.



Enclosed blocks – these may not be solid (and thus visually more open), but are still taking a lot of floor space from public use and function, a characteristic they share with the massive urban blocks. Therefore they also become objects public needs to walk around. Depending on the materialization (for instance a big brick wall, transparent fence or a wall of greenery), the view into the property (a garden, playground or industrial site) and the local weather condition (when raining there is nothing available that protects you), this can either be a pleasant walk, or a place that you would like to pass as quickly as possible. The condition that defines enclosed blocks, the surrounding by private property of a mass, does not seem to be occurring for housing functions; the examples that we find in the city are all institutes (1-3) or places of work (more or less 4), which could be understood to have a less private demand to their outside space.



1



2



3



4

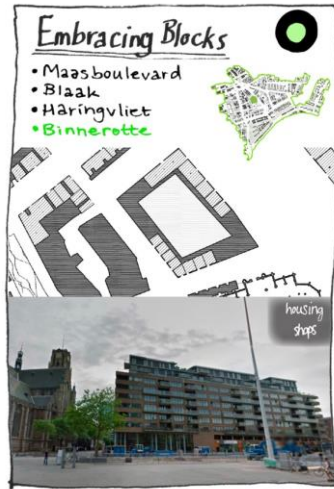
Embracing blocks – are creating (almost) dead ends within them (while from the outside being perceived as a block). Mostly this space within is private, which is either formalized by a fence (1) or only by a mere suggesting in the way the private building is surrounding the outside space (4). These can become parking spaces or inner (private) courtyards or gardens (1-4). This arrangement of closed space appears to be frequent for housing (1-4), and would suggest a private demand of the space it surrounds.



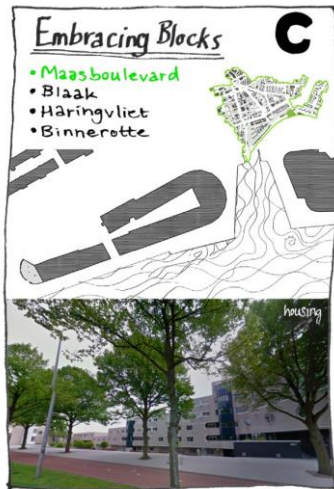
1



2

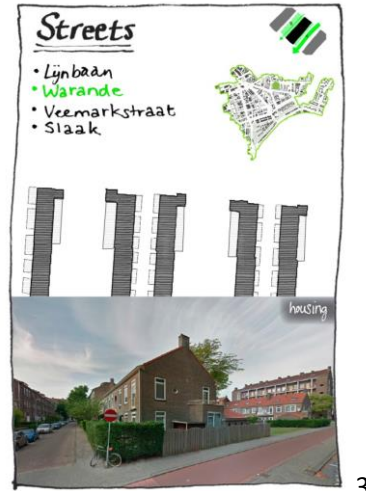


3



4

Streets – linear narrow structure that has a front and a backside (including (2 and 3) or excluding (1 and 4) private open space on these sides). It allows for a linear movement of the public. Within the fire line, we can find streets with a more private character because of their only function being housing within the block (which are often surrounded by private outside space) (2 and 3), mixed blocks with shops on the ground floor (4) and shops only (1).



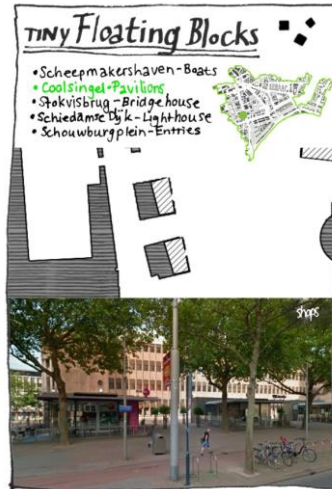
Tiny floating blocks – are built structures that humans can move around in many ways. Possibly these blocks get perceived as objects (as they can be seen in one glance), and get more public attention because of that. Their function often appears to be exceptional: pavilions turned into shops (3), service structures (2,4 and 5)– sometimes turned into monuments or cultural amenity (4), and actual floating blocks boats (1).



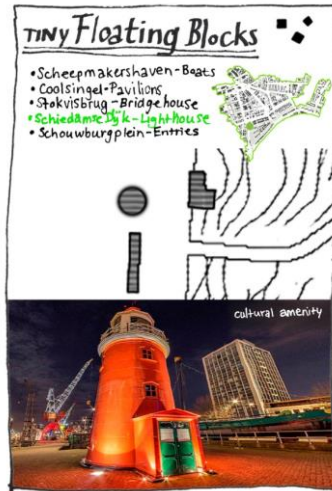
1



2



3



4



5

Appendix D Examples of elements in public space of Rotterdam



Figure 63 Sample of map with elements (own ill.).

Raised green applied as separation (between roads, 1), visual element (in front of the market hall, 2), and privacy creation (on the square by the water, 3).

Grass surface used as separation (between roads- above the green dots, separating the tramline from the cycle pathway (4)), as well as the paths top right, a green patch with pedestrian road between two car roads(5)), visual element (the triangular patch in front of the church (6) and the patch between the two roads (5)), elements of use (the lawn in front of the market hall which has a slope used for sitting and artworks that are used as climbing racks by children (7) and the area to the right with meandering footpaths used for dogs to run an poop (8)).

Trees used as separation (to indicate walking routes in front of the church (9) and separate car traffic from the slower traffic by the green patches (10)), visual element (in the triangular patches in front of the church (6) and in the patches in the top and to the right (5)).

Vertical barriers are applied in the form of raised floors to direct the public (steps and raised green in front of market hall (11)) and in the form of fences to protect the public (from falling down (raised platform tram station, 12) or meeting traffic (tram that goes through grass (13))).

Artworks are placed mostly placed on points where pedestrian streams cross (14 and 15).

Benches are spread around squares (in linear arrangements on the church square (16) and the square bottom right with single rotating chairs (17)), around centers of public interest (in the center around the main shopping street (18) and around the station's bike shed (19)).



Right to left: raised green separation, protective fence and separating grass.



Right to left: privatizing raised green patches, spread out seats and vertical barrier including steps to separate areas within the square. This steps has potential to become a place for people to rest or socialize.

Appendix E Interviews

Appendix E.1 Sample selection

The selection of the participants is done by quota sampling: while selecting, I strived for at least variation concerning the variables: age, culture, education/occupation, gender, visitor/inhabitant, living inside the area/outside. To save time the recruitment started with asking different people that I knew myself, if they would want to participate in these interviews conducted at their preferred location and time. Once started, the original sampling got filled up by the help of the participants by so-called “slowball-sampling” (Hennink, et al., 2011).

Older people that had been living in the city for their whole live, by going through their memories actually added all their (changed/different) perspectives in different chronologic stages of their life. Therefore these also can add to general conclusions of perspectives at different stages of life. For the sample, I strived for the following rules to ensure equal representation on all facets of public experiences:

1. Gender. 1:1 (also within age categories, see 2).
2. Age: preferably two in all age categories of 10-20 (adolescents); 20-30 (); 30-40(single or family with children); 50-60; 60+.
3. Different origins (in Rotterdam since [Year and Age] because of [Reason]): at least the perspective of: born and raised in Rotterdam, moved there at a later stage in life, only tourist.
4. Different locations of living: Inside or Outside the area of the fire line. Both should be present.
5. Different occupations.
6. Different cultural background.

The actual mix had the subsequent composition:

Person	Gender	Age	In R since	Because of	Occupation	Living	Culture
1	F	52	1984 (20)	Studies	Communication	Outside	Belgian
2	F	25	1990 (0)	Birth	Student	Outside	Dutch
3	M	16	2000 (0)	Birth	Student	Outside	Dutch
4	M	14	2002 (0)	Birth	Student	Outside	Dutch
5	F	17	1999 (0)	Birth	Student	Outside	Surinam (2nd)
6	F	15	2001 (0)	Birth	Student	Outside	Surinam (2nd)
7	F	48	1987 (19)	Studies	Merchant	Inside	Dutch
8	F	56	1960 (0)	Birth	Artist	Outside	Dutch
9	F	45	1985 (14)	Immigration	Shop merchant	Outside	Surinam
10	M	46	1988 (18)	Studies	Art teacher	Outside	Dutch
11	F	50	2004 (38)	Love	Artist	Outside	German
12	F	63	1953 (0)	Birth	Creative	Outside	Dutch
13	M	67	1949 (1)	Birth	Handyman	Outside	English
14	M	65	1970 (19)	Studies	Doctor	Outside	Dutch
15	M	23	2014 (21)	Studies	Student	Outside	Irish
16	F	23	2014	Tourist	Student	-	S.African
17	F	23	2015 (22)	Studies	Student	Outside	Dutch

Already we can see that the total range of ages and a full 1:1 composition of female:male is not achieved. The range 0-10 is left out consciously, as I expect they will not be able to express their experiences aptly (at least not in the format presented). Ages 70+ are often not taking part in the daily inner city life either and are not always capable to perform in the given setup anymore either. This, combined with the gap of data between 30-40 years, as well as the general overrepresentation of women in the sample, should be taken in consideration when reflecting on the general validity of this data for the actual composition present at future and in the present of different people. The linear representation that is strived for in these interviews (see also fig. 26 light), does not match with the actual shape of distribution that are living and expected to live in Rotterdam (fig. 27). Ideally, the data should be given more weight according to the population composition that is presently and in the future in Rotterdam (fig.27), applying the rule of democracy.

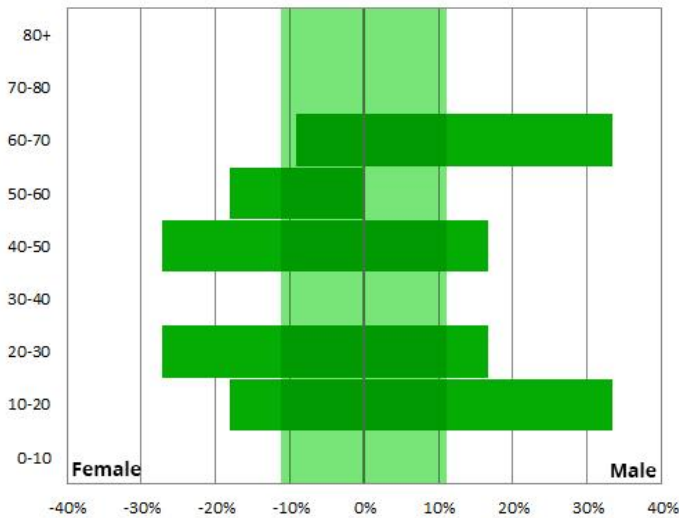


Figure 64 The actual (dark) and desired (light) composition of age and gender of participants (own ill.).

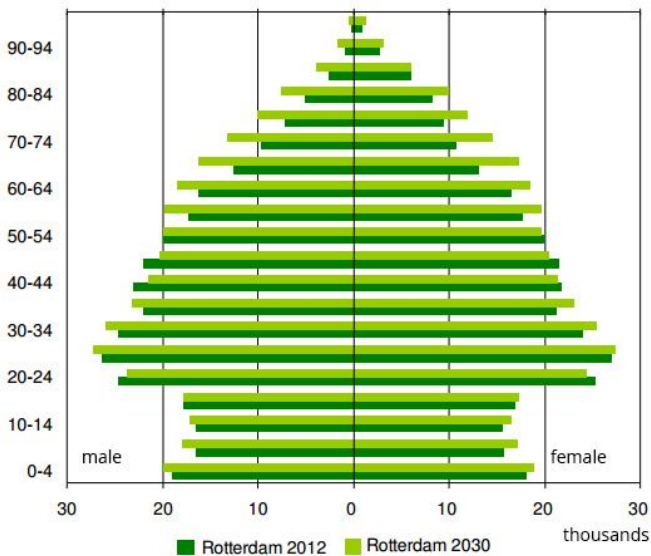


Figure 65 The population composition of Rotterdam in 2012 and as prospected in 2030 (Hoppeteyn, 2012)

Appendix E.2 Setup

So as to produce knowledge on the fundamental perception of the public of the public space, a tabula rasa of the public space for the memory to project its experiences on was produced: an A0 noli map of the area of the fire line in Rotterdam with its direct surroundings, covered by a transparent sheet. Either the interviewee or the interviewer (or both) would note (in drawing or text) the experience the interviewee remembers. The interviews would take place on a location and time that suited the interviewee. This ended up being at their home, in the library or a café, in their cleared or free and one of them in the work break. The interviews were one two four hours in duration. The variants of the setup are drawn below.

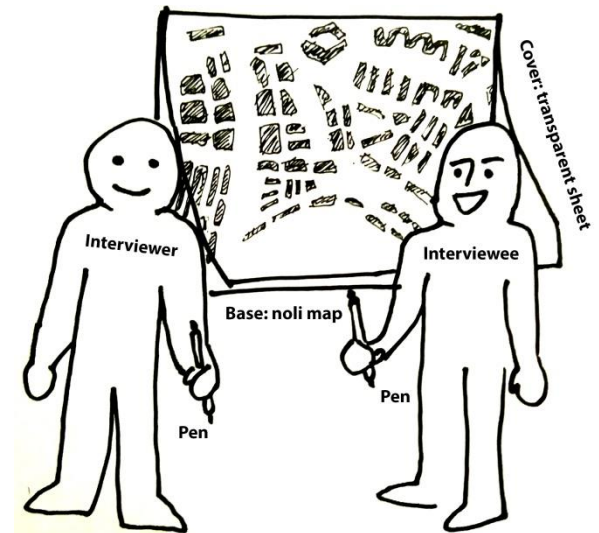


Figure 66 Different setups of the interviews (own ill.).

Appendix E.3 Limitations

Besides the sample being limited in quantity and diversity, there are a few limitations to the interviews that should be considered in the way the data can be interpreted.

Concerning the tools that were used, there were two disadvantages. First, the giant sheet, did not allow much for a flexible setting. Many times the sheet appeared to be too big for the table that was available, because of which sometimes the sheet was moved to the ground, which probably resulted in the interviewee feeling less invited to note down their own experiences. Second is related to the tools of expressing the memories: words or drawings. Both are limited expression methods of (sometimes complex) feelings, and are very much dependent on the skills of the person in either of these mediums.

Another aspect which has influence on the result is the choice of the group of people. Although a mix of people with different backgrounds was strived for in order to represent the a mix in the way you could find in the public space, the ways of perception are very personal and by far not only dependent on the sectors mentioned before (age, culture, education/occupation, gender, visitor/inhabitant, living inside

the area/outside). It is by no means possible to collect all the different perspectives of perception of the city. Another important factor that has influence on people's narrative and possibly on their remembering is the mood that they are in. Although the setup of the interview on the location and timing by the wishes of the interviewee was trying to make the environment as relaxing as possible, it is acknowledged that there are many more factors that influence the mood of a person.

Then there are a few conflicts rooting within the chosen method that influence the given answers. Firstly, this comprises the problems related to human memory and the act of remembering. One of the limitations is the types of memories a tabula rasa and the big area produces. The main concern here is that these might produce only extraordinary memories, although for the lives of the person the daily, repetitively or habitually experiences might be equally or more important, but are just not remembered. In the interviews however, people did mention elements like "I always cycle here to go to X". Related to the scale of the drawing, you could wonder also how detailed and refined the answers will be. On the way memories get constructed, another remark can be made: people tend to remember stories of others and (unconsciously) integrate them into their own memories. For the relation to the space of the experiences however, it doesn't really matter if the person him- or herself has gone through the event. The most influential aspect about using the memory of people as the basis of research I believe, is related to the act of remembering. Although a lot of elements of our experiences are stored in our unconscious brain, they get retrieved to the conscious as elements of these get triggered. This is mostly by seeing or experiencing an element that is similar to the specific memory. Working with a tabula rasa, with the only point of reference being the black floorplan of the surrounding buildings, demanded much of the imagination of the interviewee. It is likely that in another setup with more references, maybe more detailed memories (although coloured/triggered in a certain direction) would be produced. Related to this point of reference is also the different way people understand and read the material that I provided: for many, they could not orient themselves according to this floorplan only. To resolve this, I added the names of the main streets, as during the interviews this appeared to be a mode of communication about their memories (mostly for orientation purposes).

Lastly, another limitation lies in the beaconing of the main question to the area designated in white in the presented drawing. Although it is likely that in the area marked in white (the official public space) public experiences happen, public experiences are not limited to this space. Luckily, many interviewees did not take this boundary very strictly, and talked about experiences bordering the public spaces also. In this way, also the differences between mayor private experiences in their lives could be observed.

Taking note of all these limitations, these interviews should be understood to produce an *indication of the types of experiences* people can have in public space. It will produce specific examples of experiences that can be used in a game setting later for inspiration and it will give an idea of general uses/perceptions of specific spaces in the area (and the type of spaces missed and miss- or underused). Considering these limitations, observations will serve to further indicate the local situations.

Appendix E.4 Referential results

While working on the merging of the data the interviews produced, it was mentioned to me the work I did resembled the tradition of the Situationists and the philosophy of Psychogeography. Although the

point of departure and purpose of these defer from the intent of the interviews I conducted, I do think it is valuable to mention their approach as their origins stem from the same interest.

The field of psychogeography arose in the 1950's from the critical reflections on and as a reaction to the common urban geography by the artist and theorist's collective Letterist International. Psychogeography was one of their methods of reflecting on the urban environment. One of the members, Guy Debord, defined psychogeography as "the study of the precise laws and specific effects of the geographical environment, consciously organized or not, on the emotions and behavior of individuals" (Debord, 1955). They experimented with many techniques to arrive to an emotional (or behavior-wise different) experience of the city as well as in depicting and reacting to these. As they joined with the International Movement for an Imaginist Bauhaus in a conference, they adopted the idea of "Unitary Urbanism - the synthesis of art and technology that we call for — must be constructed according to certain new values of life, values which now need to be distinguished and disseminated" (Wolman, 1956). As such, one could understand their work and philosophy as a countermovement to the modern shapes the city and the city life took in those times (especially in cities that got affected by the world war). One of the popular exercises of psychogeography became the 'dérive', the act of consciously leaving ones regular motives and relations to the city and wander in a movement of drift. When in the 1990's the situationist theory became popular among artists and academics, this mode of movement and other playful modes of perceiving and experiencing the city, formed the basis of the newly developed praxis of psychogeography. The renewed interest in the field can thus be explained as shifted from a form of protest, to a milder reaction to dissatisfaction of the modern environment counteracting the boredom of everyday life.

Like the interviews I conducted, psychogeography seems to have the same interest in combining the subjective knowledge of human experiences with the (objective) physical elements of the spatial environment. The root of this interest in the modern environment is similar to the condition of the area within Rotterdam's fire line. Also, opposed to a phenomenological approach to understanding human experiences in and relations with space and spatial elements, psychogeography accepts the specific situational aspects of a place (hence the name situationists), rather than generalizing experiences.

Unlike many of the practices of psychogeography however, the method I use is explorative in a collective matter (not on the scale of the individual unique experience and expression): it seeks parallels in perceptions of different people as well as differences that inspire. Also, it relies on the human memory to filter out the essential aspects of the experiences, whereas many methods of psychogeography apply a more observatory documentation method.

The document with the combined interviews coined another reference. This time the contemporary acts of psychogeography of Jan Rothuizen. He produces, as he himself calls it 'soft maps', containing the experiences, knowledge and stories he acquires during his walks in cities. His method falls in the category observation-documentation.

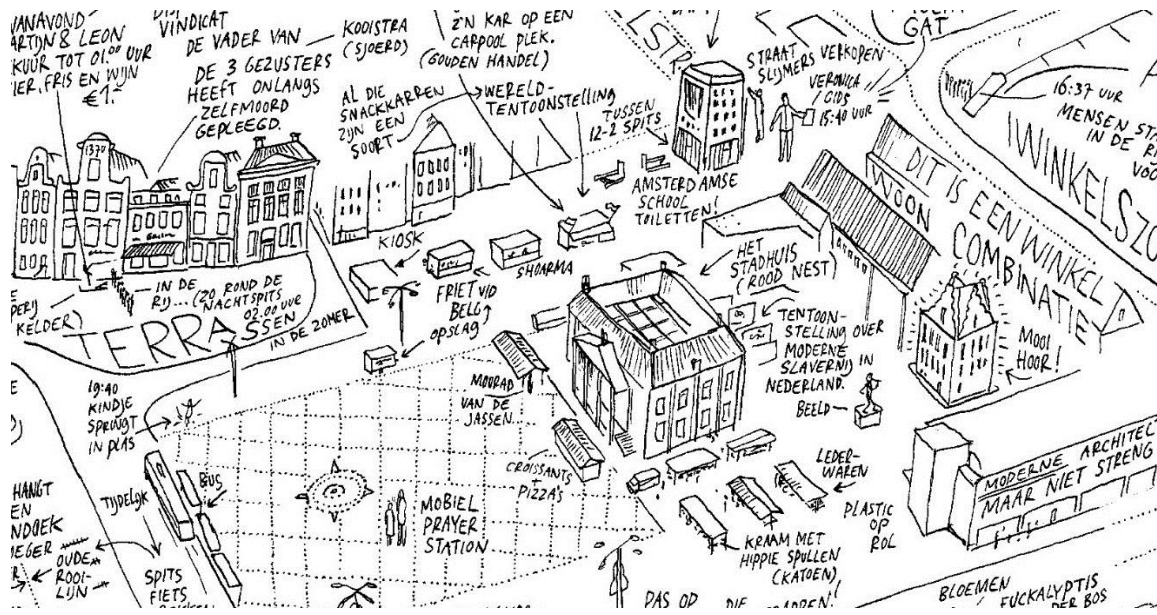


Figure 67 Sample of the Softmaps of Amsterdam, location Grote Markt (Rothuizen, 2014)

Appendix E.5 Categories results

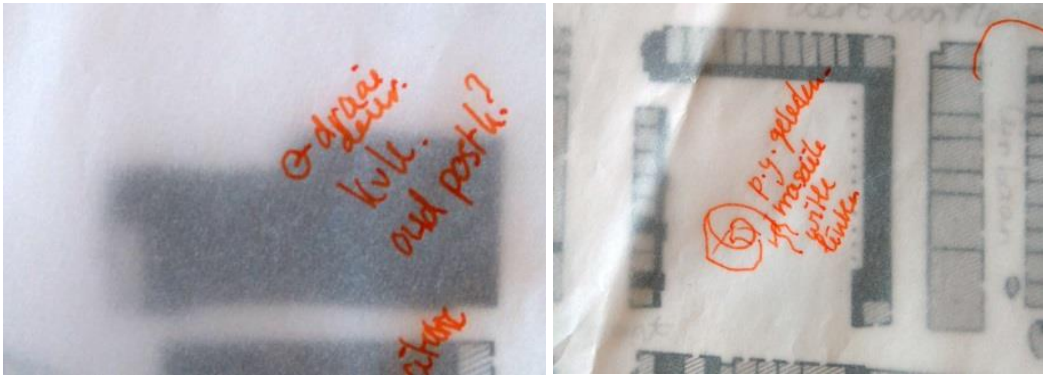
SEEING

The relation described in these kinds of experiences with the interviewee, is a passive receiving connection with the surrounding.

Seeing/sensing (elements of) an object/person/animal/nature/place, recognizing a place (by name or by physical attributes), attracting attention, elements of orientation.

Examples:

Elements and objects that draw attention.



Elements of orientation.



Example of used phrases: "Here is [object, place] – [not followed by an activity]."

SEEING

We all perceive through our senses firstly, before we can interpret, think or feel anything as a reaction to what surrounds us. Within the way the surrounding comes to us however, from the interview there appeared to be different modes of perceiving and levels of attention. I will describe these different categories below. The map of memories related to seeing looks as follows:

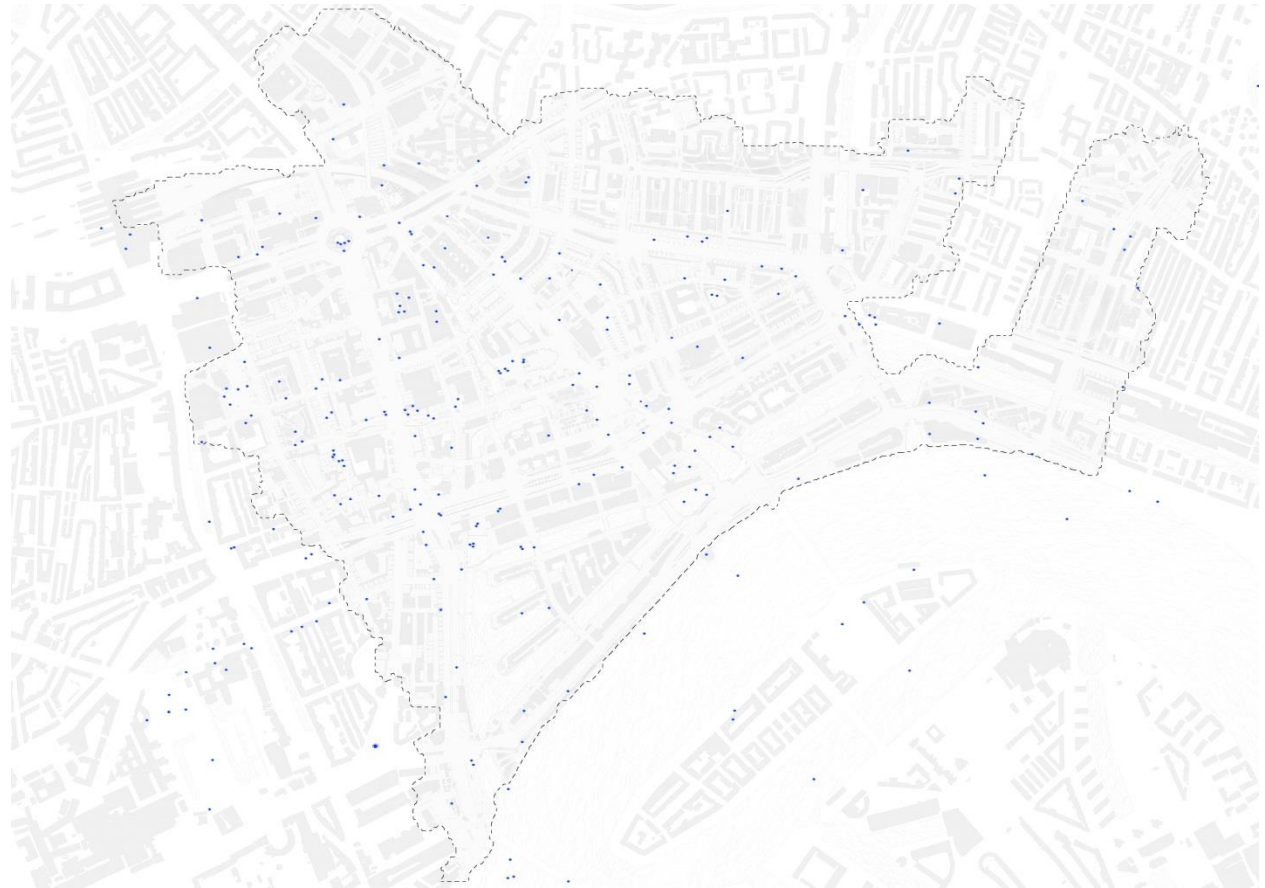


Figure 68 Point on the map which involve a relationship governed by the act of seeing (own ill.).

‘Seeing’ should not be understood only as perception through the eyes, but in the broader sense of ‘experiencing’, the way the surrounding gets perceived, ‘enters’ the human. This action appeared to take place in the interviews relating through: icons of recognition, objects and scenes intended to be seen, remarkable details, the other and the other’s life, experiencing through forces. This order, as I will elaborate later, reflects on the state of presence: from a more passive attention, to a more detailed focus of attention towards the environment.

1. Icons of **recognition** (orientation and communication)

The way this word is used can be defined in the following meaning of recognition in the Oxford dictionary:

The action or process of recognizing or being recognized, in particular:

1. *Identification of a thing or person from previous encounters or knowledge.*
2. *Acknowledgement of the existence, validity, or legality of something.*

Memories of this kind narrated in the interviews, were indicated 'Here is X', without any further mention of its significance (also not after further inquiry about this).

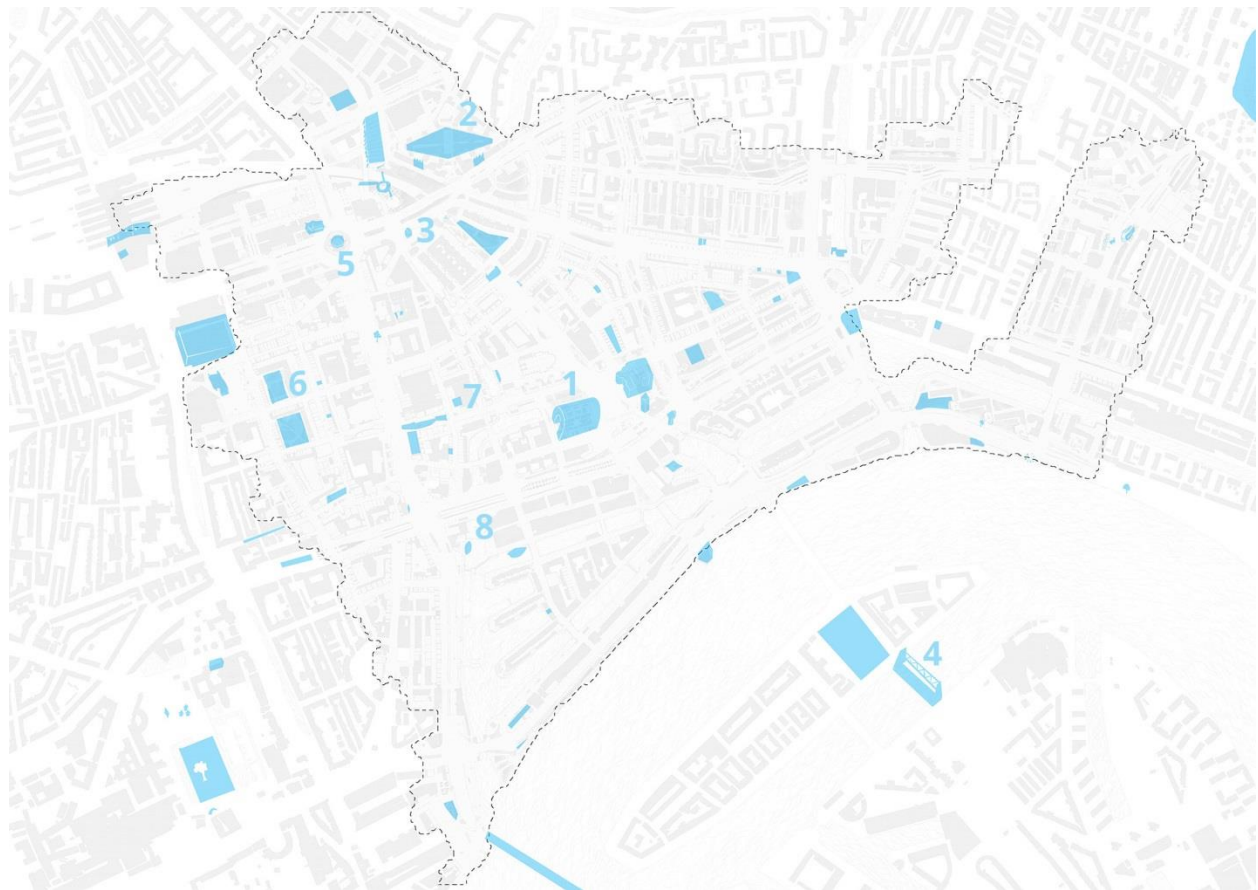


Figure 69 Places and objects of recognition (own ill.).

These object and places stand out mostly because of their enormous size, their peculiar (big/simple) shape or outline (iconic value 1, 2), and are mostly but not all placed on junctions or bordering other important traffic arteries (3,5). It includes buildings (1,2), big art structures (3), infrastructural elements (bridges 4), other relatively big objects in open spaces (trees, podia, lonely play objects, bushes or benches, fountains 5), big open spaces (squares, parks 6, playgrounds, sport fields) and also elements with the same characteristics in the semi-public realm (big or specific shops 7, recreational and cultural venues).

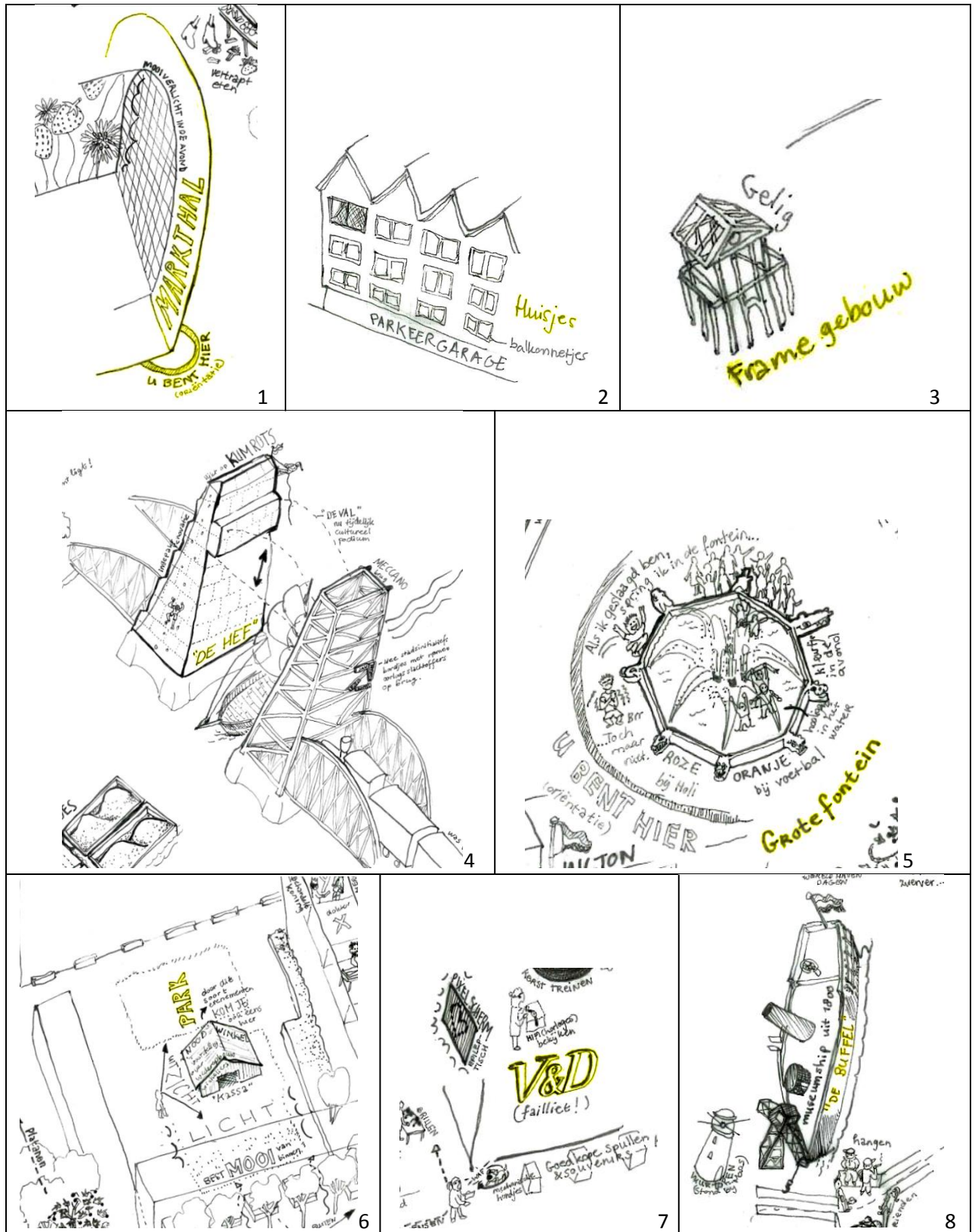


Figure 70 Examples places and objects of recognition (own ill.).

Within the interview, these places and objects had a significance that could be described as: orientation, communication or unknown. Many of these served within the interview as objects or places of orientation on the map (to recognize and locate themselves 1,2,5), and sometimes were specifically indicated by the interviewee to serve as places that have an orientation purpose in the actual life itself as well (1). It is likely though, that even if not mentioned explicitly, these objects and places are valuable for orientation purposes in peoples' experiences.

Besides orientation function, they possess a known form of communication: they have a communication value which is transferred in their name. This means that these are common places and objects that do not necessarily need a specific personal connection – it can be known or valued by or through others (4,8).

It could be also that these objects and places, have a value in a memory that the person cannot retrieve (an unknown desire or significance) (8).

Whatever the use or reason of the connection, the common denominator in this category is the absence of any interest that goes further than a general one. Some of this can be because the interviewee finds the object not that important or interesting (consciously or unconsciously), that it does not take the effort to dig in its memory to see if there is a specific thing he or she can say about it. However, some of these places or objects appeared to be the scene of a more specific, detailed or personal experience as well (either for the same interviewee or another one).

2. Objects and scenes that are **intended to be perceived**.

These kinds of memories are communicated through their name or resemblance.

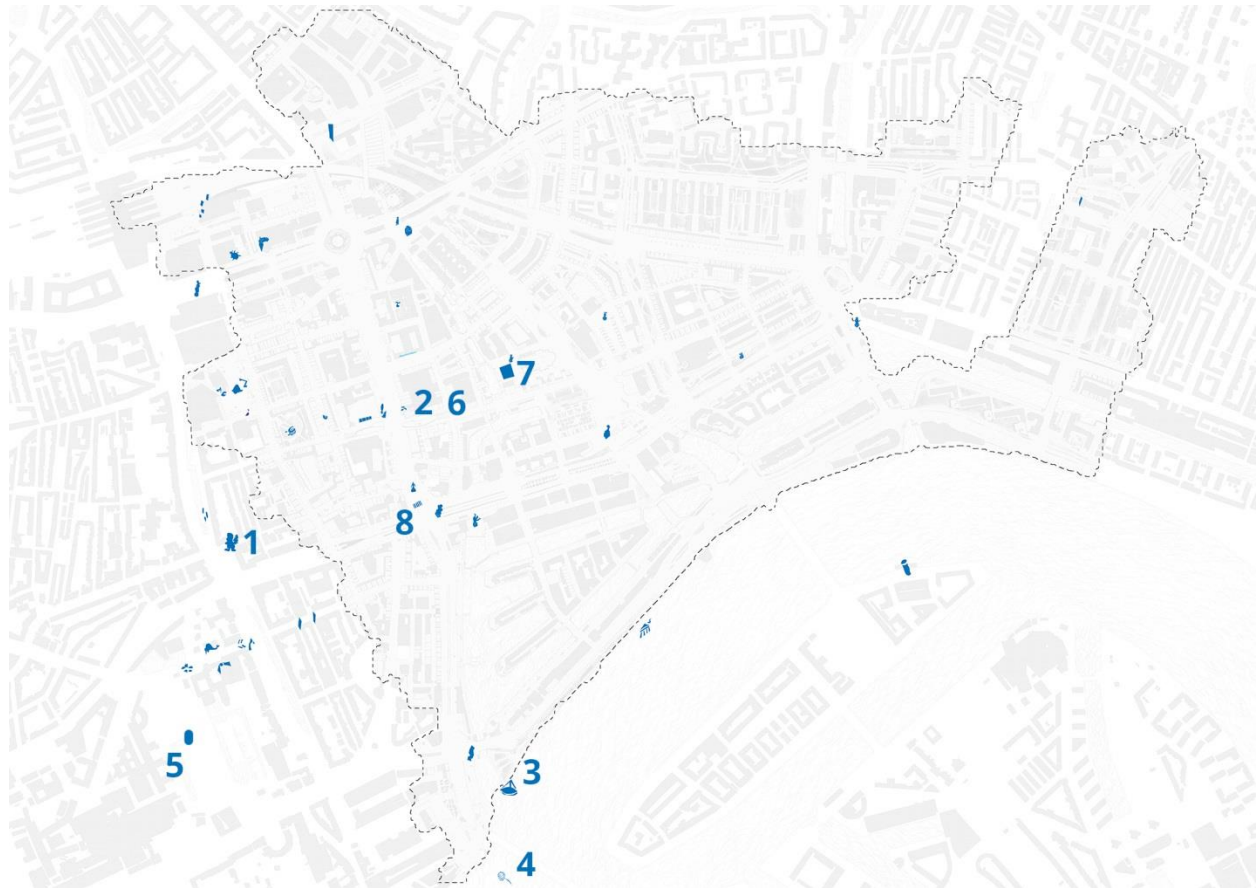


Figure 71 Objects and scenes intended to be seen (own ill.).

The only intended (and sometimes possible) relation to these objects, places and scenes is to perceive them. Just like objects of recognition, these are mostly positioned on prominent, visible places as well. They include artworks (1,7,8), decoration (2), performances (intocht sinterklaas 3 , fireworks 4, temporary acts of art during festivals 5), advertisement (6).

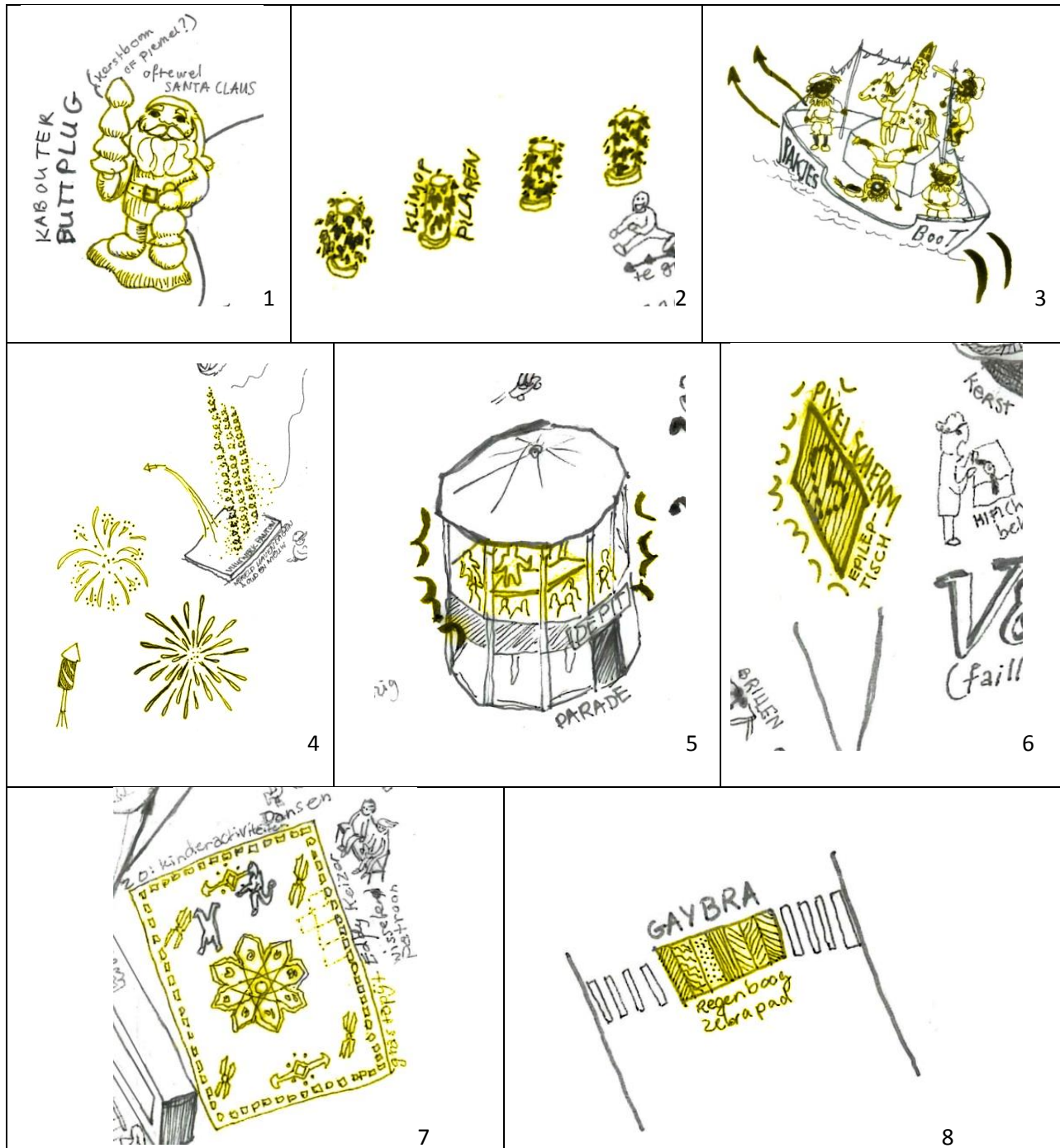


Figure 72 Examples object and scenes intended to be seen (own ill.)

Some of these appeared to have the value of recognition as well (permanent, big ones on junctions 1).

Some artworks are intended for use as well (The artificial grass carpet on the Laurensplein 7 and the rainbow zebra crossing 8).

Some of these objects were also subject of a more specific memory, a more detailed inspection (see next section and an example 7).

3. Remarkable details.

Seeing, being intrigued and because of this taking a closer look to observe and examine details.

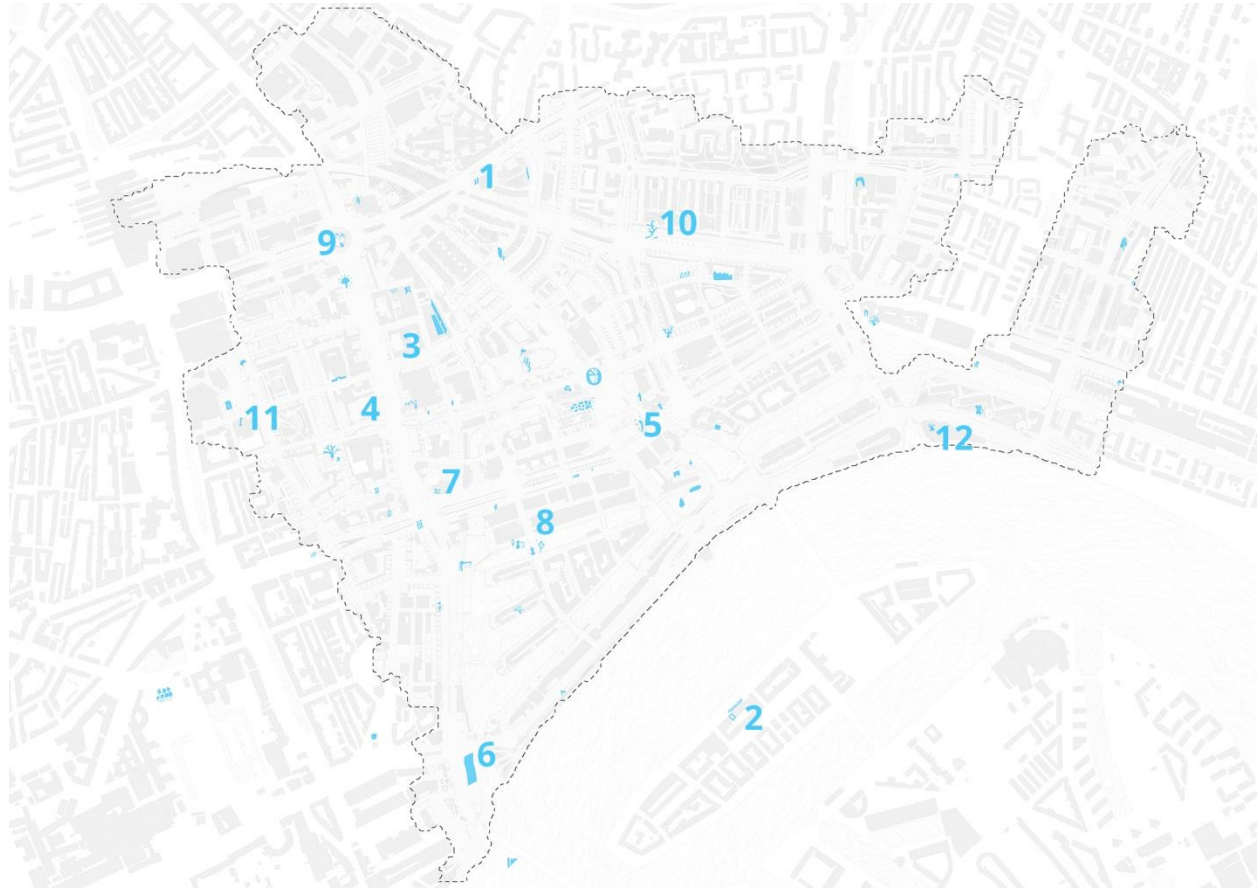


Figure 73 Remarkable details (own ill.).

These types of memories are mostly observations on a smaller scale than what happens for things that are just 'out there', the way recognition objects and show objects trigger our gaze. Unlike for instance outlines, now aspects and properties of objects and spaces, indicating elements of the whole unit of objects or spaces are observed: odd parts, materials (1,2), colors (3), shapes (4), positioning, shining (5,6), reflecting (7), punctured, ornamentation (8,9), markings.

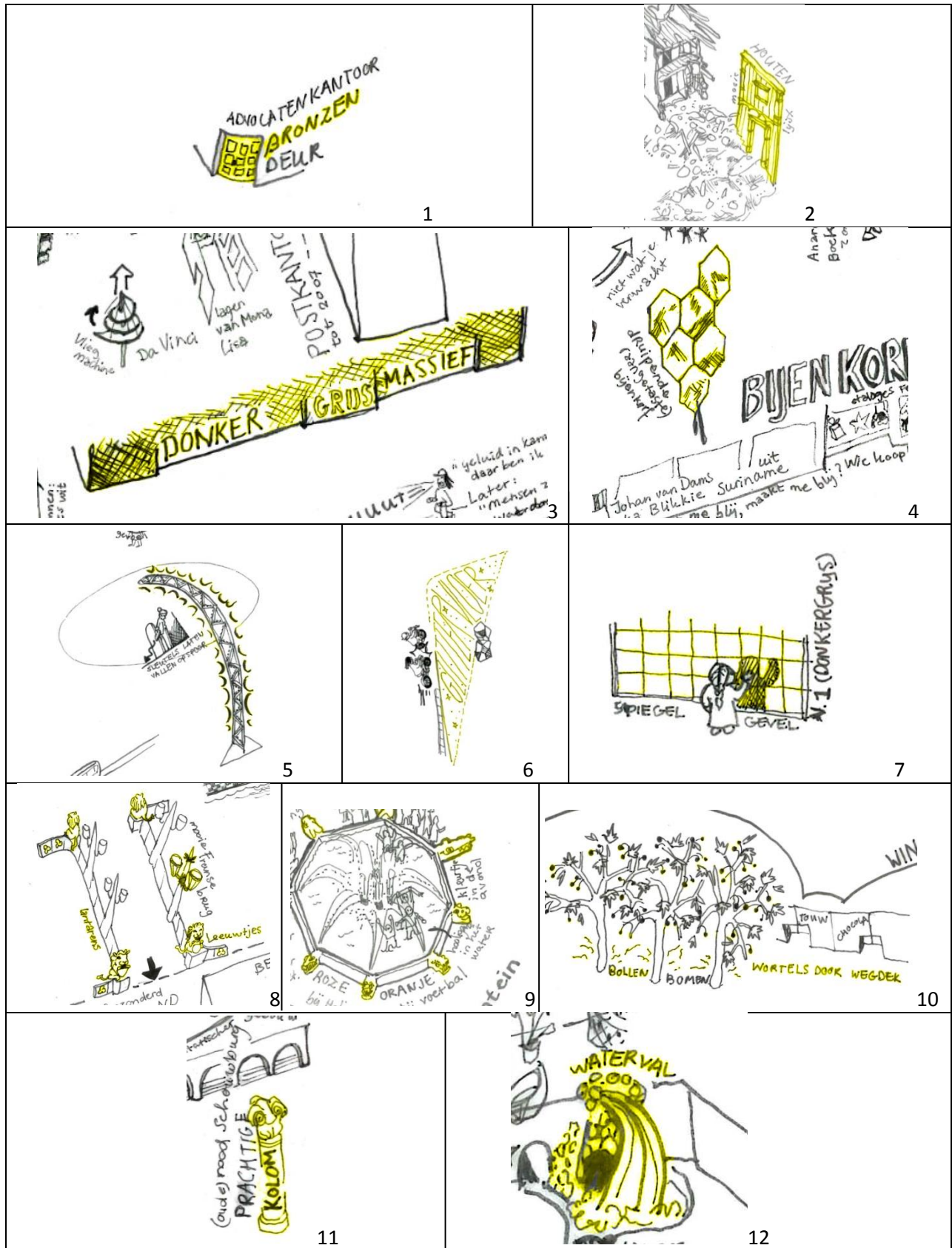


Figure 74 Examples of remarkable details (own ill.).

These experiences are embedded within a wide range of objects and spaces: historical monuments, on buildings (floors 6, walls, facades (2,3,4,7) , entrances (1), ceilings, roofs 5, stairs, small floors, windows 7) and on objects in the public space like trees (10), boats, recreational- , infrastructural works (8), or fountains (9).

Some mentions of this mode of perception, are present within private or semi-public area of the map as well, for instance the pillar in the old Schouwburg (11), an arch in the swimming pool, a waterfall in Tropicana (12).

Unlike the previous two modes of perception, this is a more (inter)active way of receiving information about the surrounding. The observation can be subjected to value judgement later, or just be remarkable by itself. This category of seeing brings forth the idea of being in a state of attention (unlike the distraction of W.Benjamin!). Also these aspects of the environment seem to attract this attention. In accordance with the trigger to play, this might be explained by the aspect being in contrast towards its environment. As noted in the analysis of elements, attention can also be directed if the element is the only thing in the environment.

4. Seeing the **other and the other's life**.

Becoming aware of the otherness: of people, other living things and spaces that encompass the life and reality that is not yours (or not accessible to you). Often this type of observation is triggered by a perceived motion.

These are mostly temporal observations (of temporary and semi static scenes). Just like looking at details, this is an active way of engaging with the seen through observation (an intentional or unforeseen observation), only now focused on life.

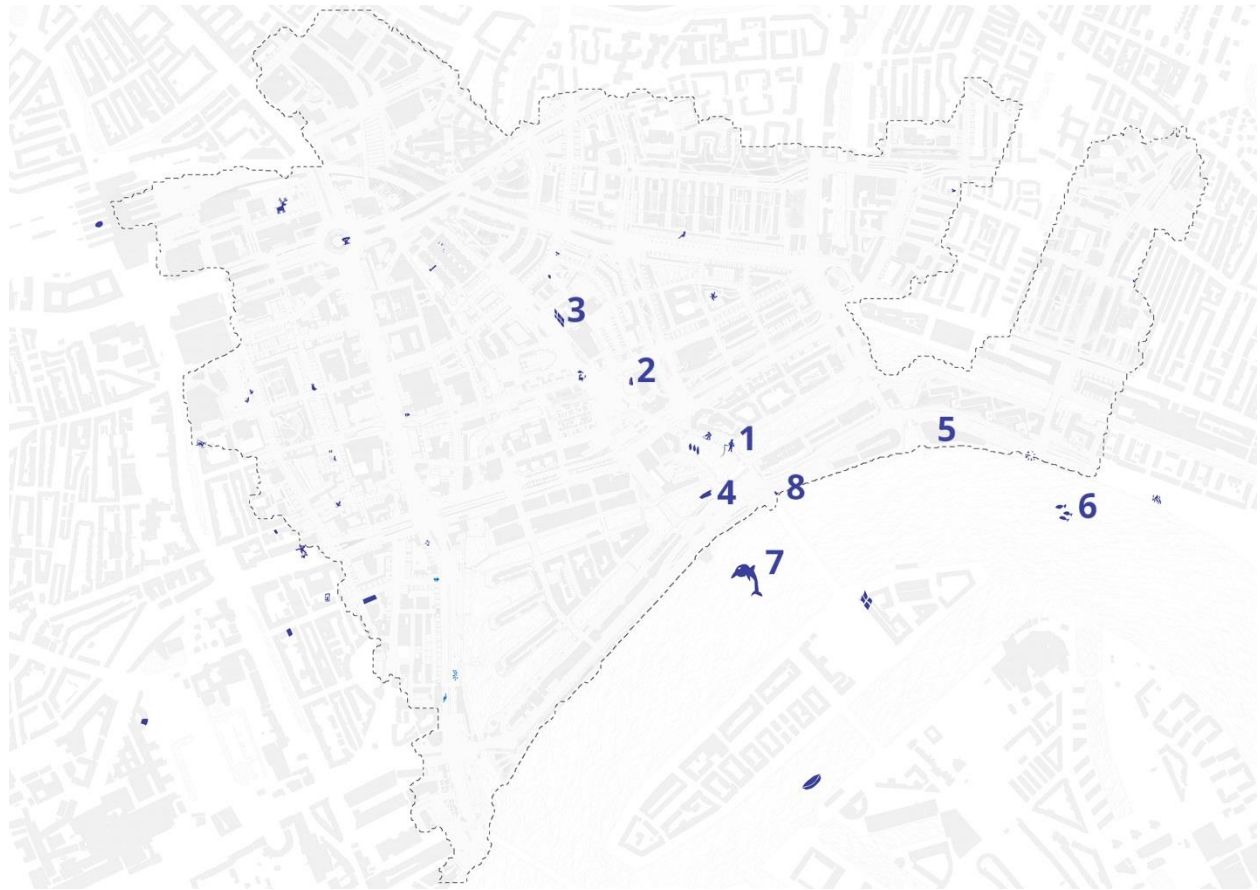


Figure 75 The other and other's life (own ill.).

The subjects of these observations can be either:

People – while performing other activities for instance fishing (1), camping, skating, children playing, standing behind a pillar (2); or while in their private life which is visible for the observer for instance via windows, balconies (3) or on a boat (4).

Animals – contained within restricted space (5), free (6-8), showing natural behavior (6,7) or adapted to their environment (8).

Shops or restaurants and other recreational venues are generally designed to provide (the illusion of) another life. Therefore, some of these memories are taking place in semi-private places for instance exotic animals as pets of a swimming pool (5).

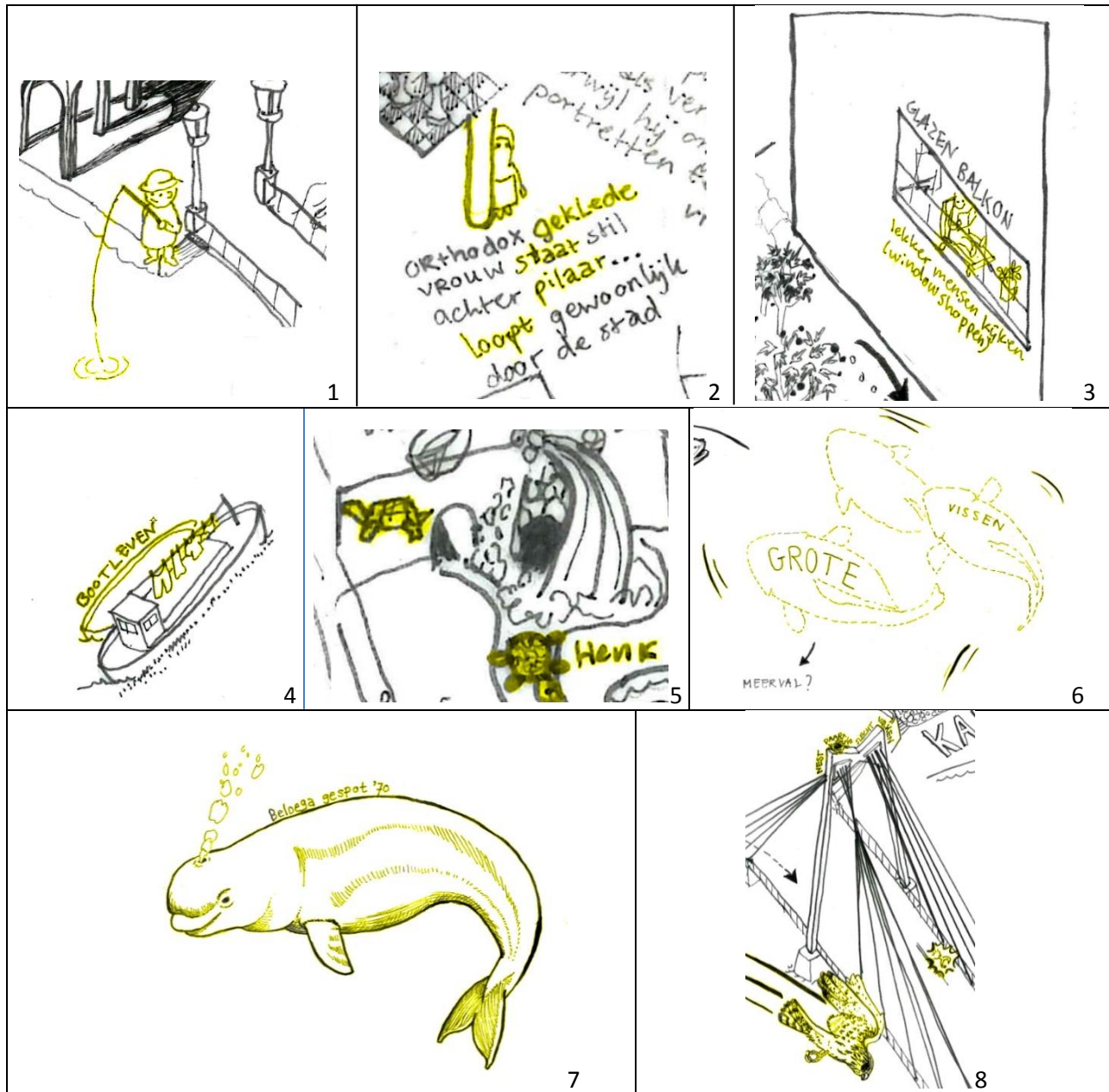


Figure 76 Examples of seeing the other and the other's life (own ill.).

In this way of perceiving (opposed to judgements made in feeling perception), the observer broadens her reality by accepting the seen (although it is unexpected). This is the first step towards the other that we talked about in the chapter on the public: a relation trough observing. As we learned there, this can amount to a more engaged relation if the other becomes aware of the observation and people start to engage in action with each other.

5. Experiencing through forces , experiencing the abstract or the **not directly visible**, contact of the senses

Discovering something through the effects which are being perceived via the process of deduction. The actual thing is often abstract, but is defined by the effects it has on the environment. The forces that one becomes aware of might be caused by humans (in that case an actual physical source can be pointed at), but most are forces of nature.

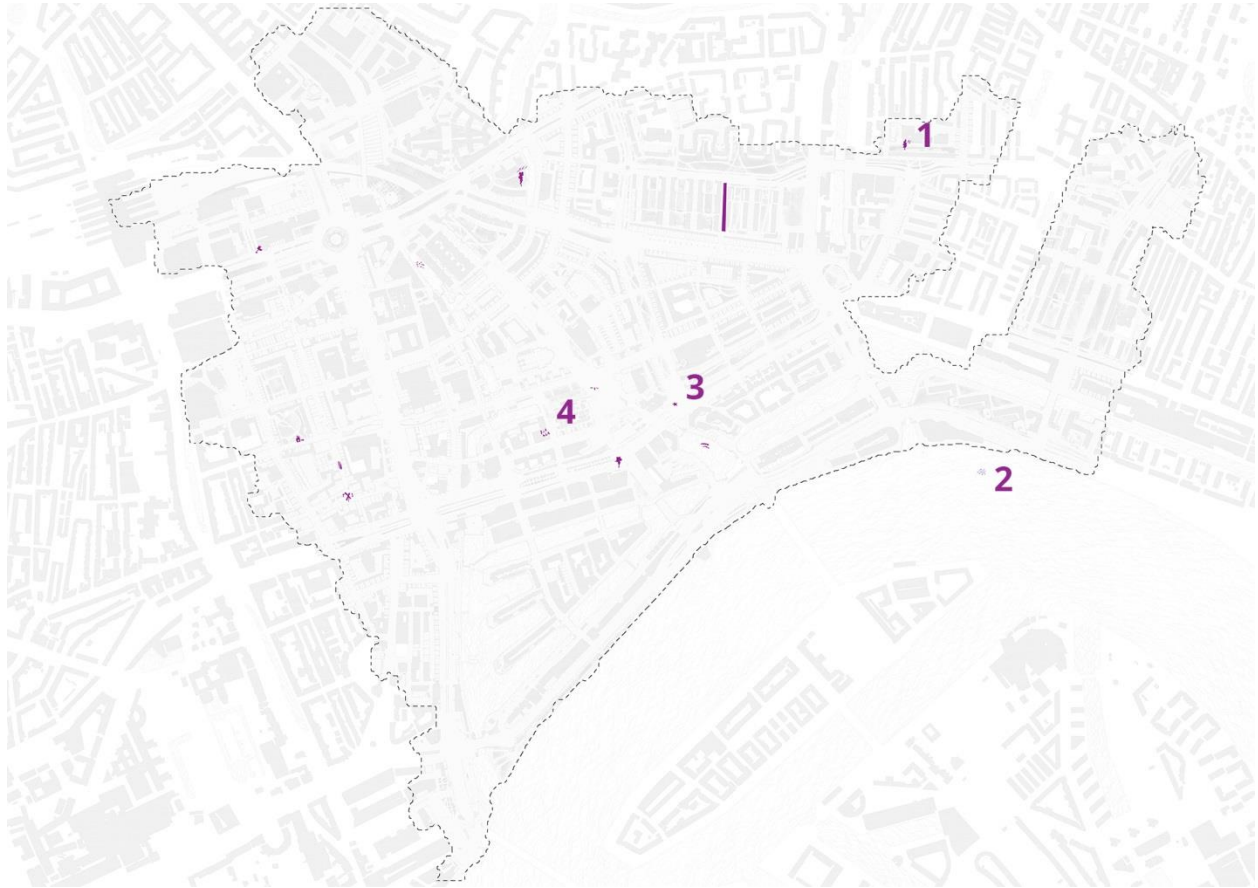


Figure 77 Experiencing through forces (own ill.).

The force of the wind: molested umbrellas, vehemently rotating art object, sound of leafs moving in the wind (1), wind raising and flying around plastic and paper bags.

Power of the sun: reflecting on the water, creating a glittering effect (2).

Our presence in a universe beyond the earth by watching the sky: watching falling stars (3).

Environments in motion and time: the sound of children indicating a rooftop playground of a school (4).

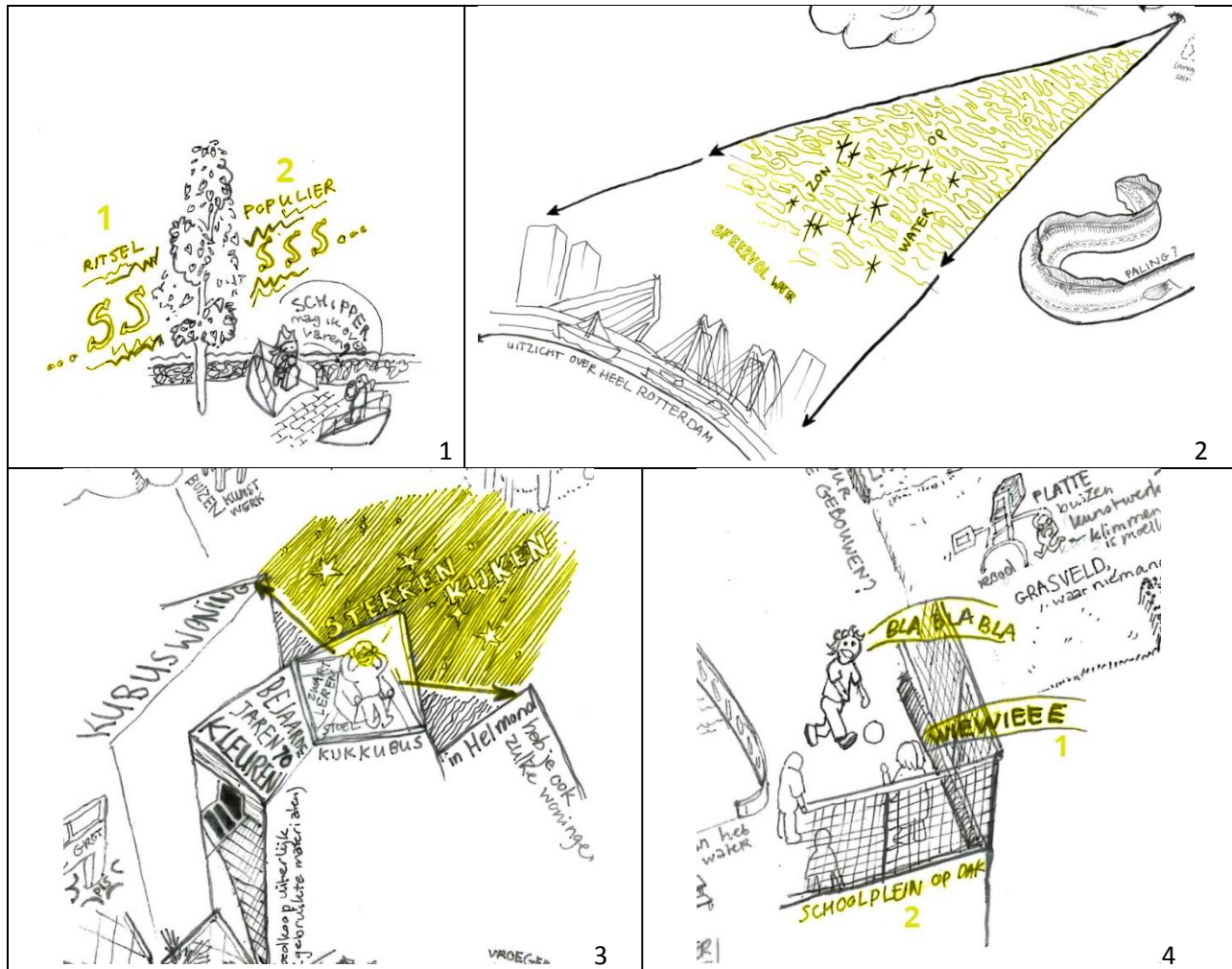


Figure 78 Examples of experiences through forces (own ill.).

Compared to the other modes of seeing, this way of perceiving the environment is attentive and much more active: it is not the somewhat following of the moving elements, but an active tracing enforced through thinking.

Although many of the effects that were talked about did not lead to the discovery of something totally unknown or unexpected (we are all familiar with the phenomenon of the reflectiveness of water and the role of the sun in this), the process of **discovering the wider context** that surrounds them is similar between them. These kinds of experiences can be useful in creating an awareness and attentive mode of perceiving the environment. It has potential for the play method proposed for public awareness in the sense that those external effects that can be perceived and the source not, raises curiosity. In such a state, a curious mind will inspect everything surrounding it in order to solve the riddle. The things perceived here are good examples of the triggers for play behavior. The difference of these experiences from play itself is that they do not involve action. As play is an interaction with the environment, one should be able to act with these forces.

The experiences that were mentioned here can also be linked to the theory of ambience, mood or atmosphere. Taking the latter into the realm of architecture, Peter Zumthor that has dedicated almost his whole life to creating atmospheres. Zumthor describes his search for architectural quality as a quest to designing something that “moves me” (Zumthor, 2006). This is what he calls ‘atmosphere’. He describes it as an instant emotional reaction, that occurs in an interaction with objects, it’s “the magic of the thought”, of the beholder, but it is also embedded in the environment which he calls “the magic of the real”. In respect to architecture, he defined his own rules to create atmospheres, his personal fascinations that he cannot seize to examine, which he suggests could have the same effect on more people : the body of architecture (the anatomy of a building), material compatibility (use and application of materials and their properties coming together), the sound of space (shape and surface materials, association with spaces), the temperature of a space (the ‘search for the right mood’), surrounding objects (architecture as “receptacles to house objects”, loving and caring collections of objects), between composure and seduction (not places of passage or direction of people, but seduce them to strolling and stay, “direction, seduction, letting go, granting freedom”), tension between interior and exterior (“the almost imperceptible transition between the inside and the outside”, what I want to see and be seen to the public), levels of intimacy (distance and proximity, the “size, mass and gravity of things” compared to my body, the feeling that they create), the light of things.

Although he does not describe atmosphere as such more elaborately, from his categories we can get some vocabulary for expressing the experiences in this section slightly better. First of all in his section ‘between composure and seduction’ he expresses the discovering nature of these experiences as well as hinting towards their sequence of discovery. He explains this in his using his project Thermes de Vals as an example: “you would enter and begin to feel you could stay there-that you were not passing through. I’d be standing there and might just stay for a while and then something would be drawing me round the corner – it was the way the light falls over here, over there: and so I saunter on – and I must say I find it a source of great pleasure” ... “it’s a kind of voyage of discovery”.

Secondly, Zumthor describes in ‘levels of intimacy’ the relation of the experiencing body towards the size of the surrounding. An example of this kind of relation in the interviews is the gazing at stars (3).

Lastly, he underlines this sense of scale and awareness of an unknown surrounding wanting to be discovered in ‘the light of things’: “the way it [the sun] comes back every morning – and casts its light on things, it doesn’t feel as if it quite belongs in this world. I don’t understand light. It gives me the feeling there is something beyond me, something beyond all understanding.”

So we can conclude it is material properties that create the emotions and awareness of the atmosphere of the surrounding, as perceived by the beholder. It’s about the different states of these properties and their combination with other materials in the environment, that create this experience of coherence: “when things have come into their own”, “when everything refers to something else and it is impossible to remove a single thing without destroying the whole” (Zumthor, 2006). Bohme, talking about ambiances confirms this relation stating it is not a relation between object and subject, but something inbetween: “... ambiances are neither conditions of the subject nor characteristics of the object. Still, however, they are the only experienced in the actual perception of a subject and are co-constituted in

their being, their character, through the subjectivity of the perceiver. And even though they are not characteristics of the objects, they are obviously produced through the characteristics and interplay of objects. That is, ambiances are something *between* subject and object. They are not something relational, they are the relation itself” (Böhme, 2001).

Within the interviews, there were a few areas that could be described as being experiences of an atmosphere of coherence. I differentiate these from the previous examples as these contain a multitude of elements that contribute to the experience of atmospheres. They have in common that many interviewees addressed these places with broad words as “gezellig” or “mooi” or “appart”. They could not all define what elements “gezellig”, “mooi” or “appart” consisted of, but together sometimes they managed to create an image of this unity and the elements that created such moods in areas (5, 6, 7).

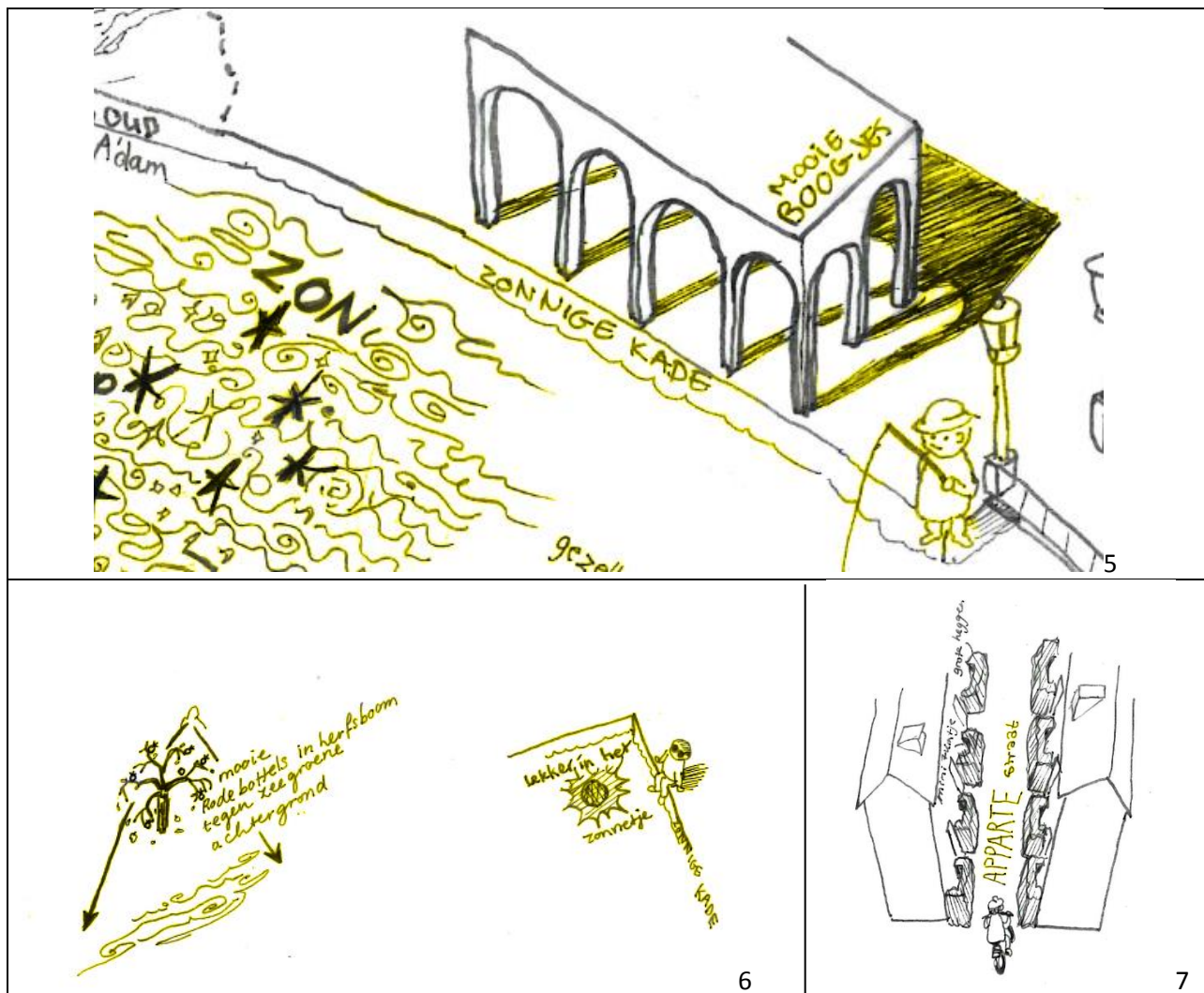


Figure 79 Examples of experiencing atmospheres (own ill.).

Essentially, we could see these types of public experiences as an awareness of a totality of a multitude of elements in space that create an awareness of something beyond the understanding of the observer and often touches him/her. It is often a discovery and fascination track that keeps the observer in a grip,

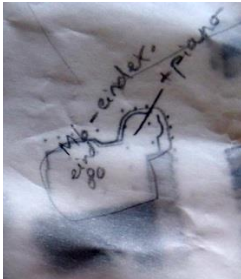
and the mood can stay with her/him for a while. It is this combination of experiences through senses other than only vision that makes us aware of a mood or a thought.

DOING 

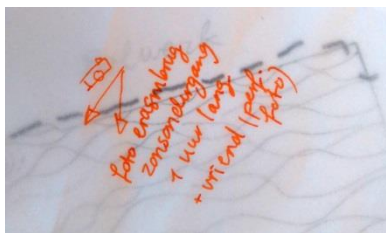
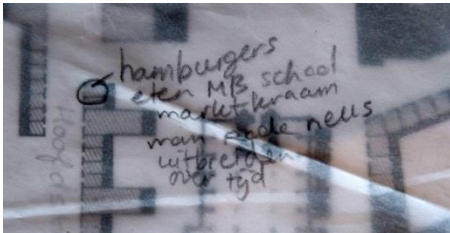
The relation described in these kinds of experiences with the interviewee, is characterized by an engagement with the environment through action.

Doing something (habitually/repetitively or incidentally). This can also be seeing someone else doing something, since this marks a relation of action to the environment.

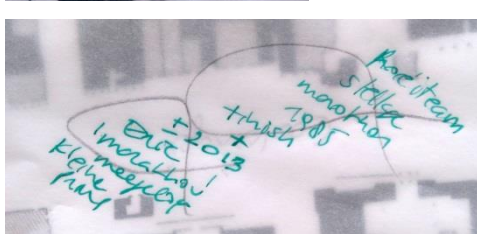
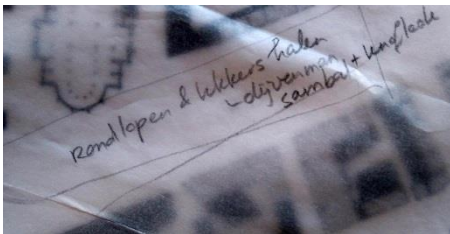
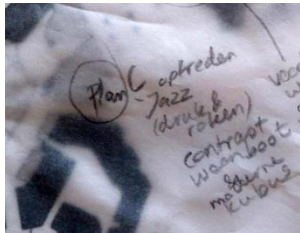
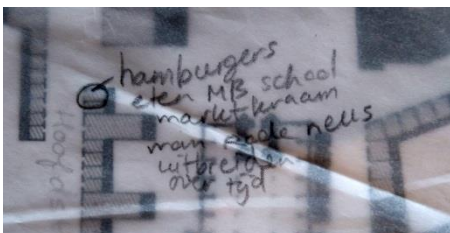
Acting as an individual



Acting with a group that has communal grounds (friends, family)



Acting or encounter with or within (a group of) people that are unknown to them (parochial realms and strangers).



DOING

After exploring the ways of public perception in the interviews, now I'll go into detail on the actions that became apparent. As mentioned before, I had a basic distinction between doing something alone, doing with someone known and doing next to, opposed to or with strangers. This section is important then to establish the state of the traditional public nature of the public spaces: the active connection that we have towards strangers. But at the same time, the main question of this interview (what are your experiences here) and the assumption only somewhat important experiences will appear to the person from the tabula rasa of their memory, creates the possibility to establish an idea of how experiences are valued (maybe private acts in public are occurring more than public ones). Following the main questions that the experience categories try to answer, the questions about the public connections in actions that in public space are as follows:

How do people relate to each other in public space through their actions? Are these levels of publicness (the self, relating to otherness in an increasing way)?

How does acting relate to the elements and conditions of the environment that they take place in? Are certain spaces generating movement, welcoming multiple use or hostile to use?

An extra question for this category: is the public space in the center of Rotterdam indeed limited in its use and therefore diminishing public experiences?

The map of memories that primarily relate to doing looks as follows:



Figure 80 Memories of the interviews related to doing (own ill.).

I will discuss this section first by distinguishing different areas of action that became apparent ranging from a more private to public use of the city:

1. **Private** acts



Figure 81 Private acts (own ill.).

These are a few accounts of acts that took place in indoor private realms. What they tell about the city is that this is a facility that happens to be in the city and that the interviewee made use of it. The focus when narrated was not on doing things with new people and they took place in privately accessible places.



Figure 82 Examples of private act (own ill.).

2. Private acts in relation with the surrounding

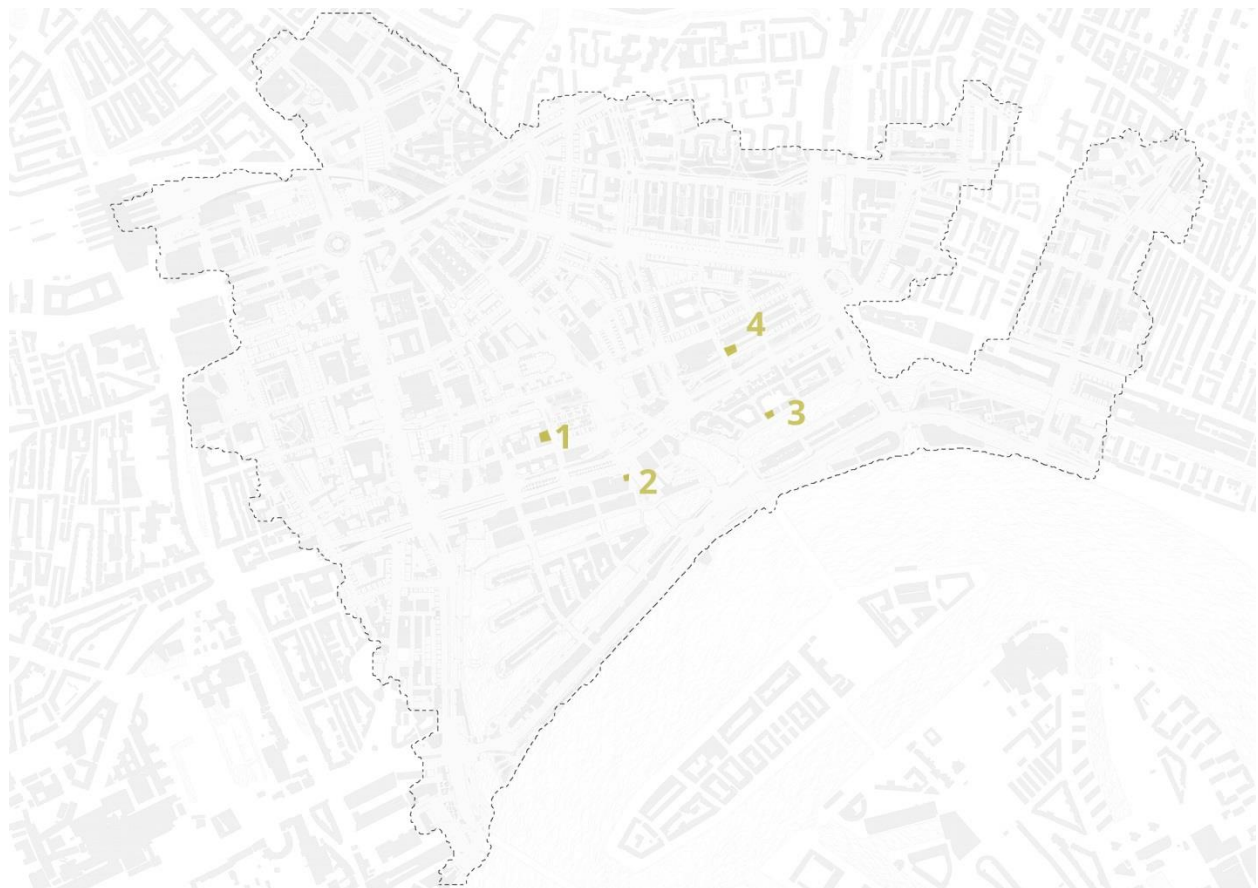
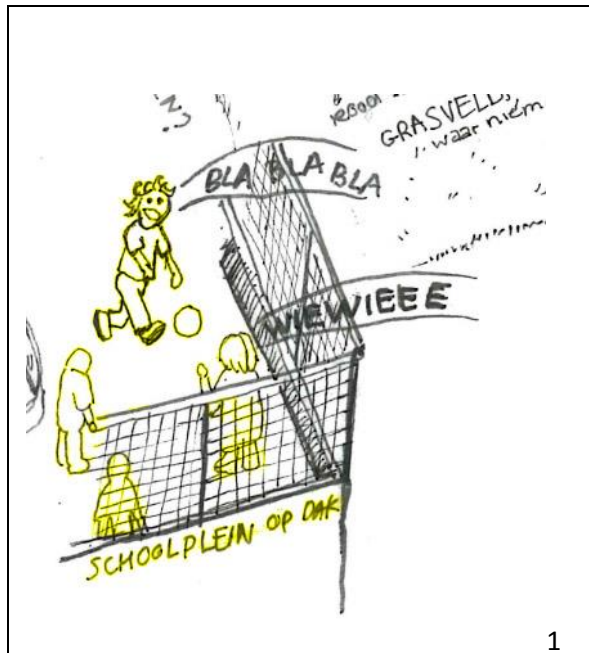
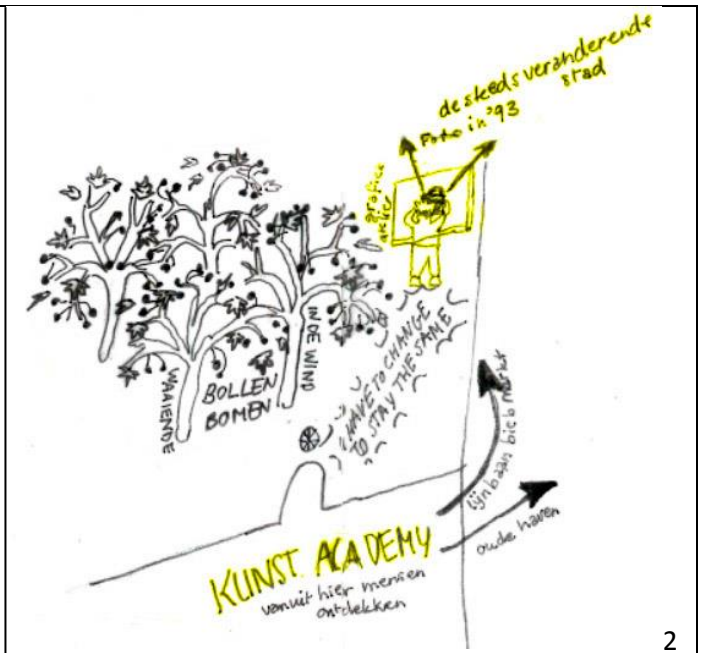


Figure 83 Private acts in relation with the environment (own ill.).

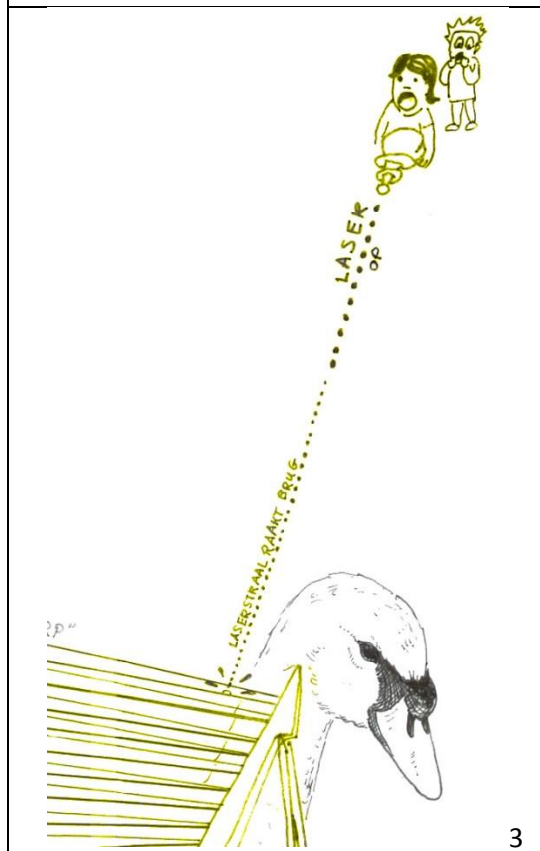
These few accounts were performed in private realms, but interact with things outside of the private realm. As we can see in the images of these cases, often they involve seeing the public environment.



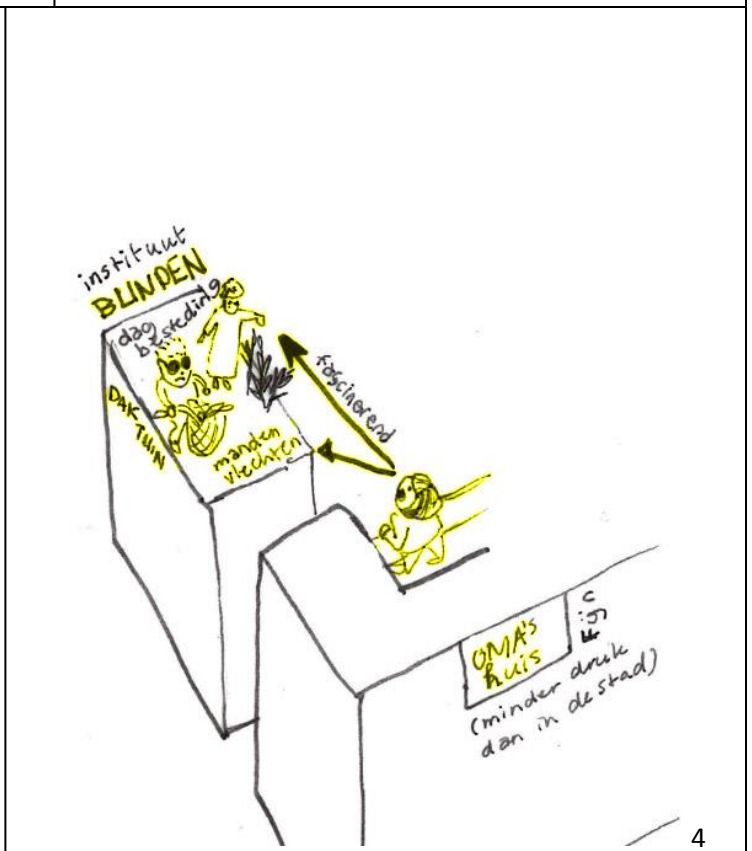
1



2



3



4

Figure 84 Examples private act in relation with the environment (own ill.).

3. Social centers of consumption

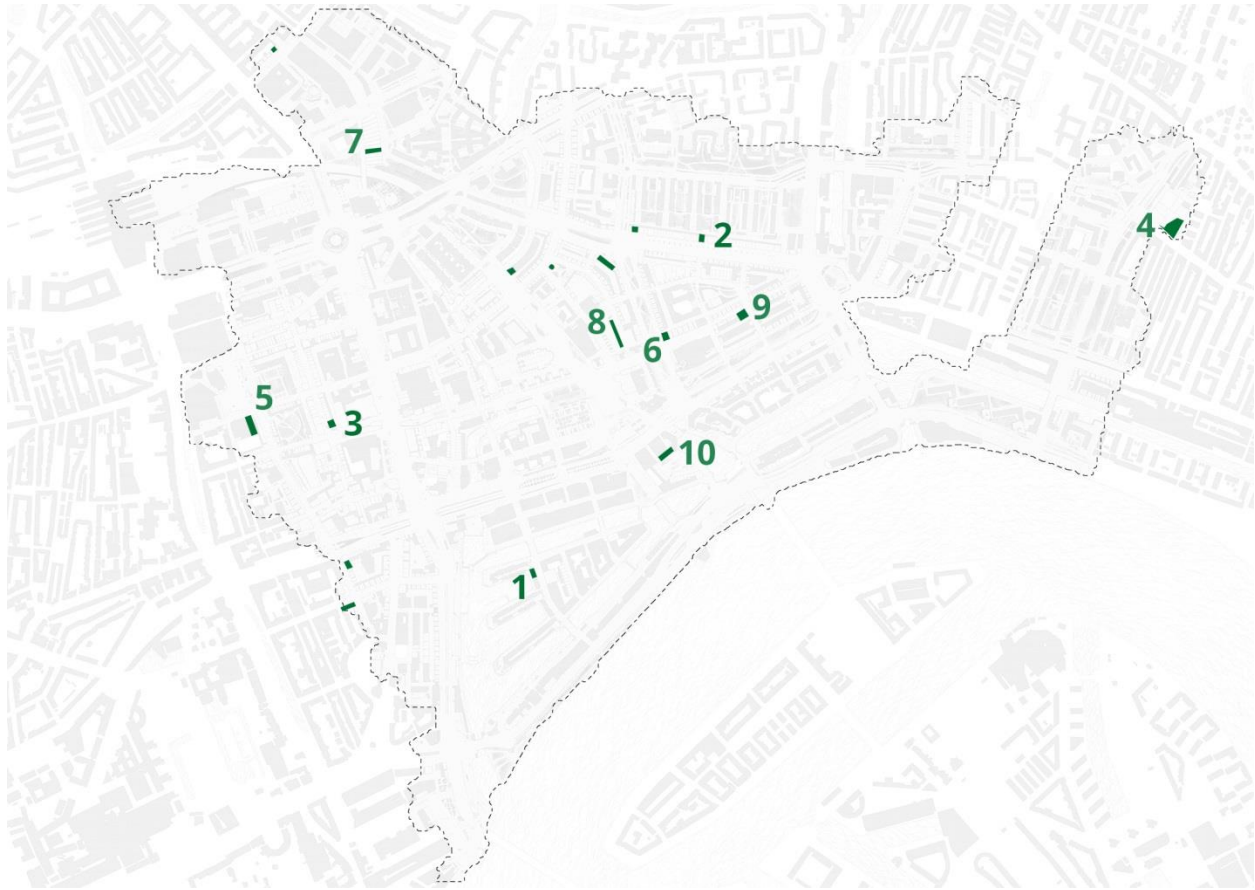


Figure 85 Social centers of consumption (own ill.).

Places of consumption were regularly coined in the interviews. This was interesting, for this implies that these places are important for people in some way or another. It appears these are often places that have a social value, however often restricted to shopping or consuming as leisure with *friends*. One of the interviewees mentioned however, that for her shops are a valuable source of social contact with strangers. She would regularly start a conversation in shops, as the wearing of clothes in a shop gives rise to the opportunity to compliment someone quite easily. Also she mentioned casual conversations with staff of frequented shops and cafes, although it was admitted that in the city center these days the staff often tends to forget who you are.

Within the act of consumption, there are a few categories that seem to have a more inwards relation (services (1), shops (3), grocery shops (4), restaurants (5,6)), a few that have a more social character that enable encounters with strangers (bars 2,7) and a few that exploit their presence at a certain location (cafes with views on public locations (10) or terraces bordering these (8, 9)). The latter still engages with the real public realm but often does not give rise to mutual contact between the people of the public.

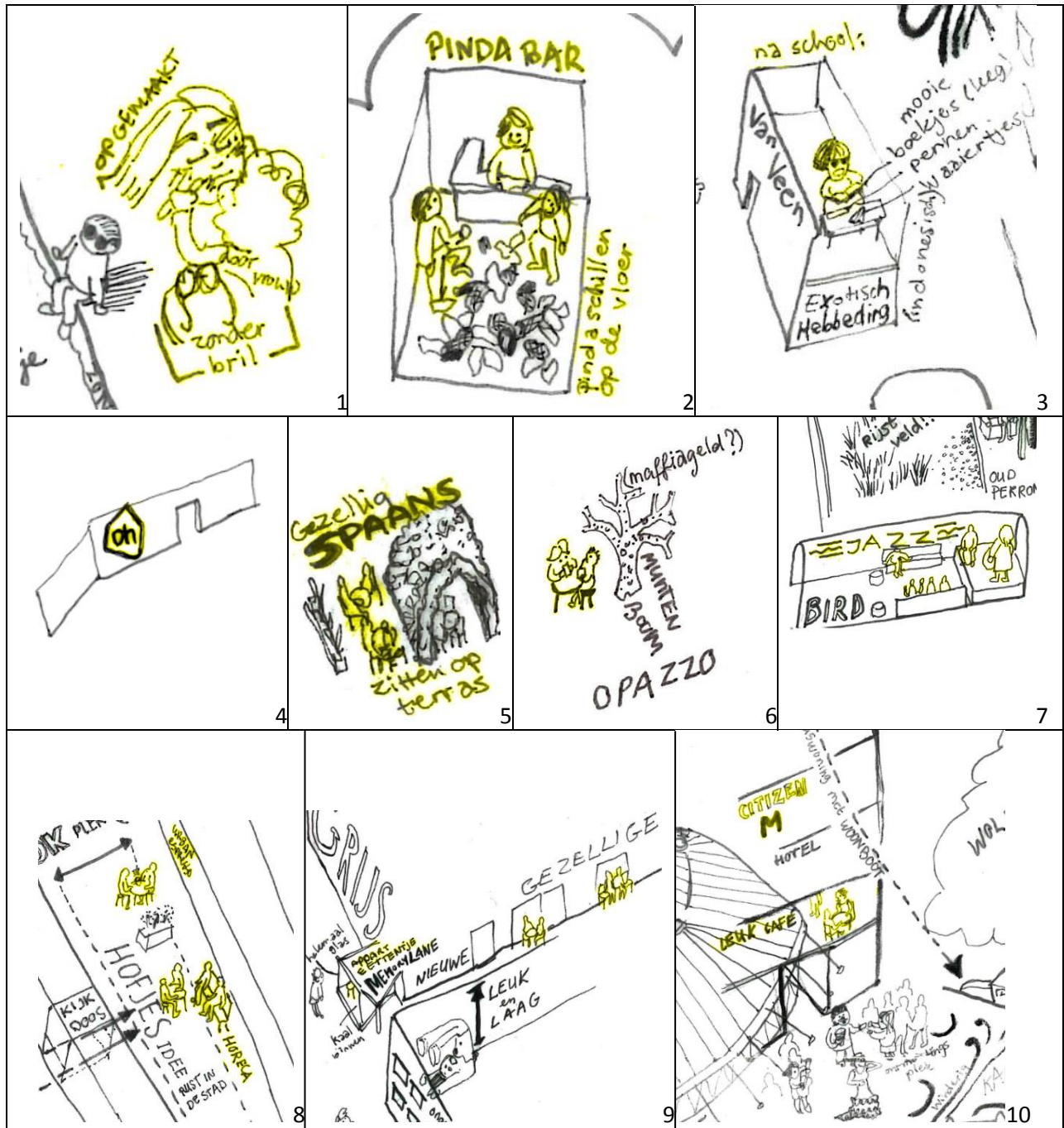


Figure 86 Examples of social centers of consumption (own ill.).

4. Social centers of cultural institutions and centers of leisure

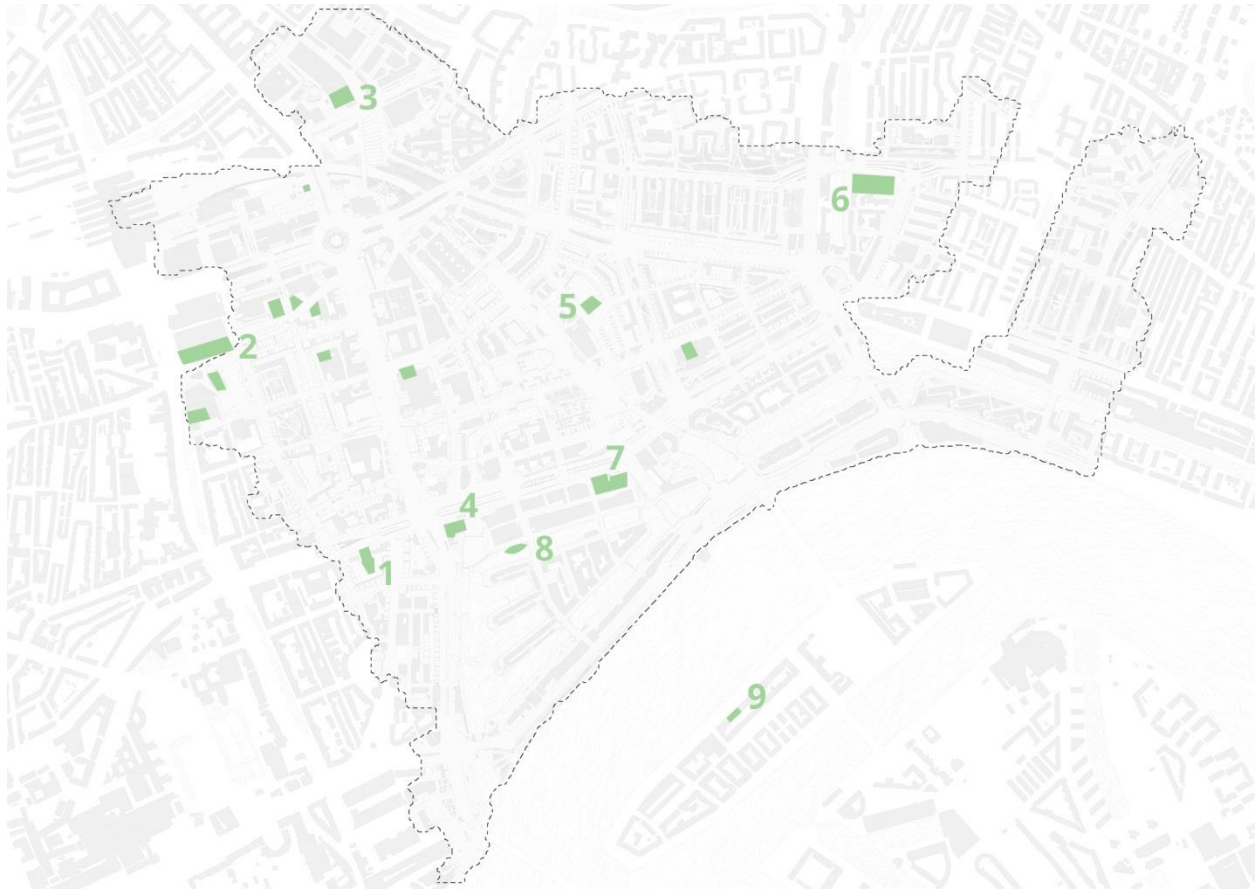


Figure 87 Social centers of cultural institutions and centers of leisure (own ill.).

Besides the soft borders of bars where encounters with strangers happen, there are other centers that are source of social contact as well. Instead of being primarily based on consumption, these are based on cultural life. Just like the activities of consumption, these cultural activities were often done in the company of some people that the interviewee already knew. However, more than centers of consumption, a few afforded more contact between people, also between strangers. From more or less open towards contact with the other we have: cinemas (1), theatres (2,3), museums (4,5), sports centers (6), schools (7), and dancing/music/singing venues (8,9).

5. Areas of public space

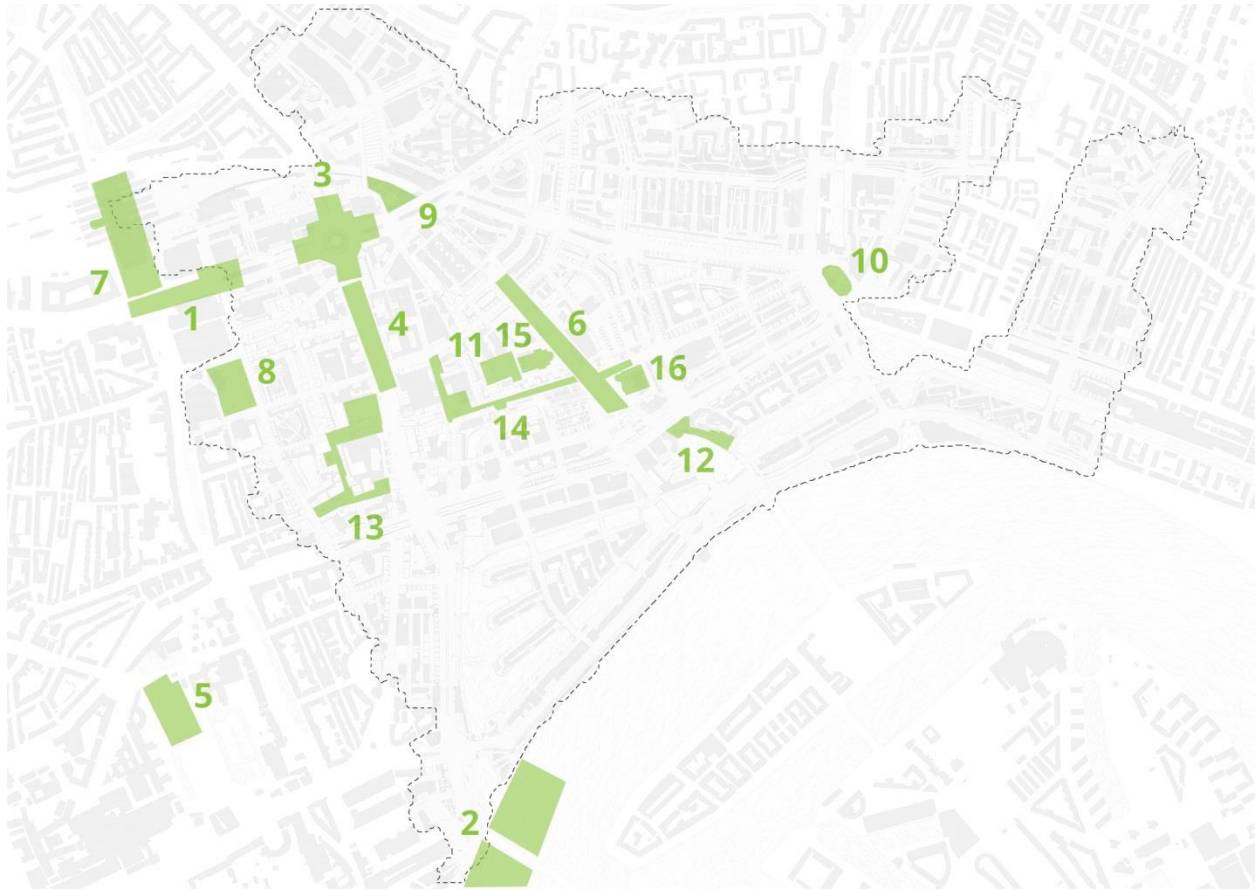


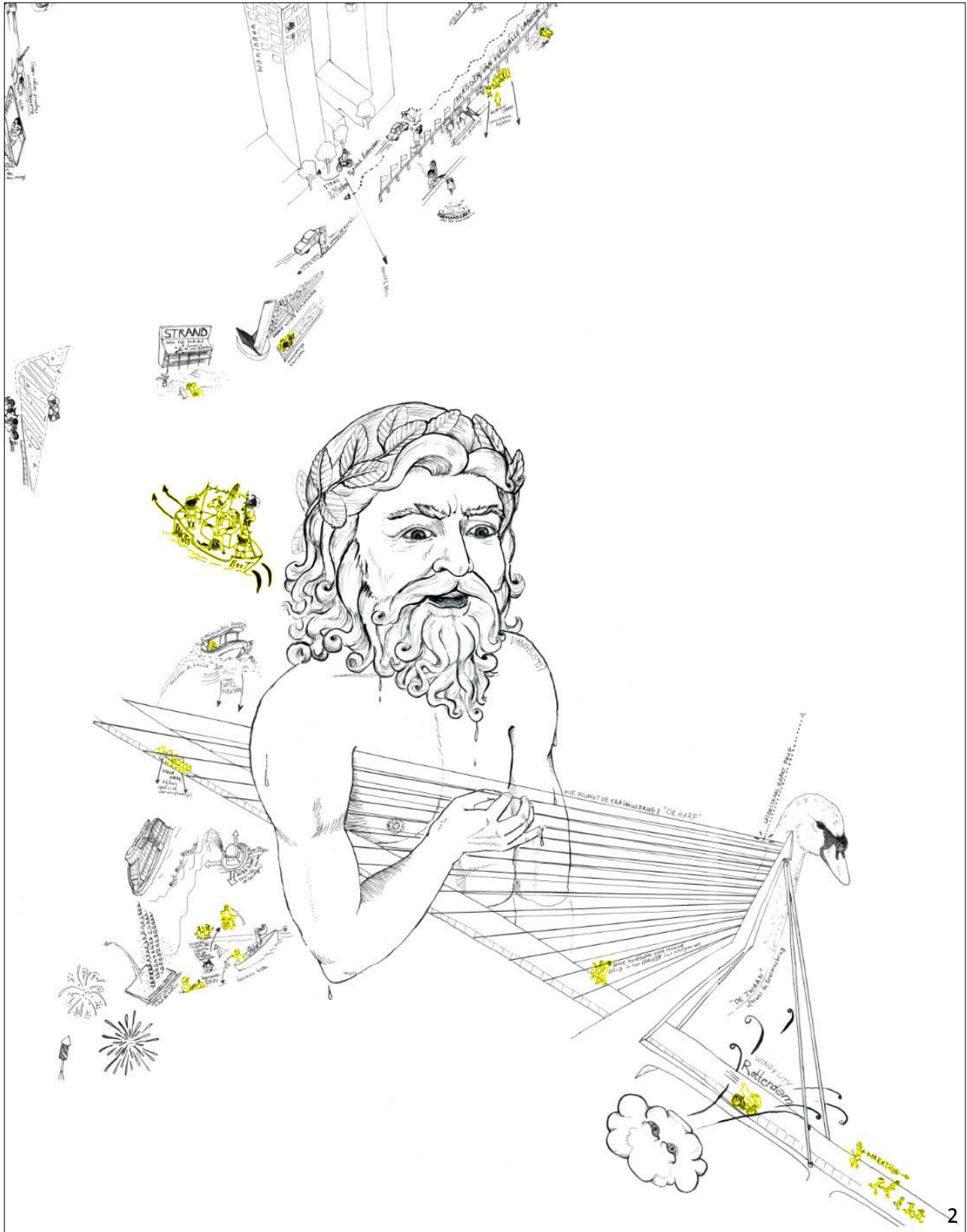
Figure 89 Areas of public space (own ill.).

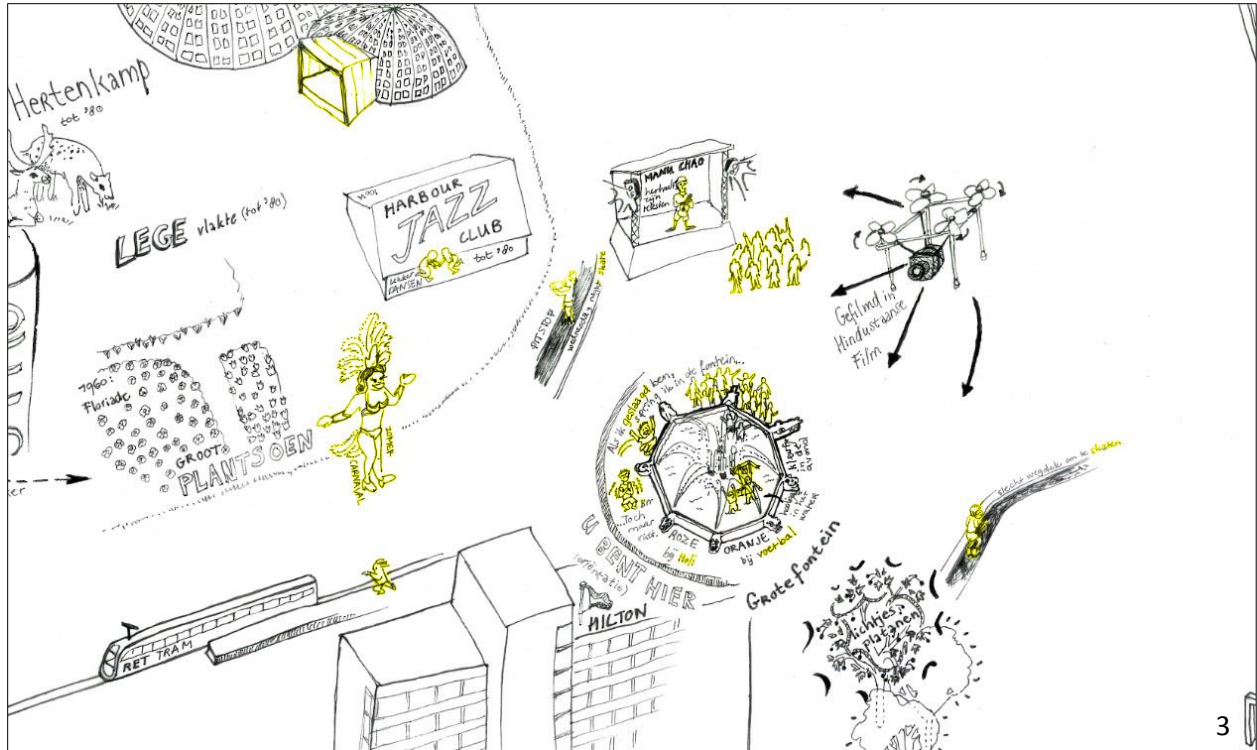
Now we have come to the areas that I officially consider public (according to the division of private, semi-public to public made in the noli map). In the chapter on morphology I had distinguished different shapes of buildings that define the borders of public space. In this section, I do not apply this division, but I will discuss the areas that according to the interviews appeared to have a similar set of activities:

Areas that are big open spaces were the scene of event experiences (being part of a crowd, watching or acting as a crowd) and otherwise seen as cold and unfriendly - either temporary open spaces around infrastructural elements (1,2,3,4); or permanently empty squares (5,6).

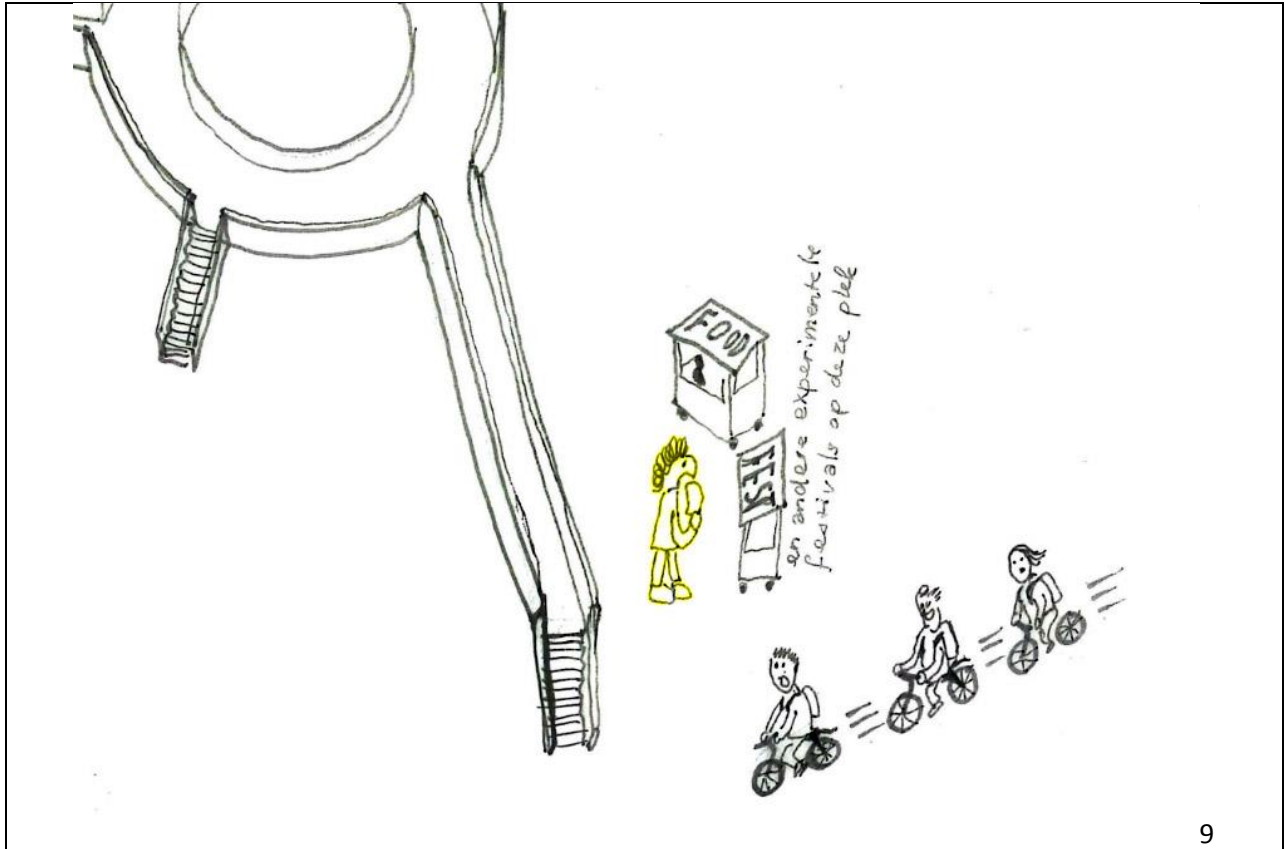
Areas that were slightly smaller but still big and open were often scenes of both events (more direct interaction with others because of the smaller scale (marketsstructure 6, 7, 8, 9)) and when containing elements of use they appeared to be the scenes of more daily encounters between people (talking, watching, feeding, eating, photographing, playing, dancing (8, 10, 11)).

Areas that had a street structure, often with few public elements of use facilities in it. These were all bordering areas of consumption (12, 13, 14). Although the surrounding places are mono-functional, and semi-public, these areas did appear to be areas of encountering others that make use of the

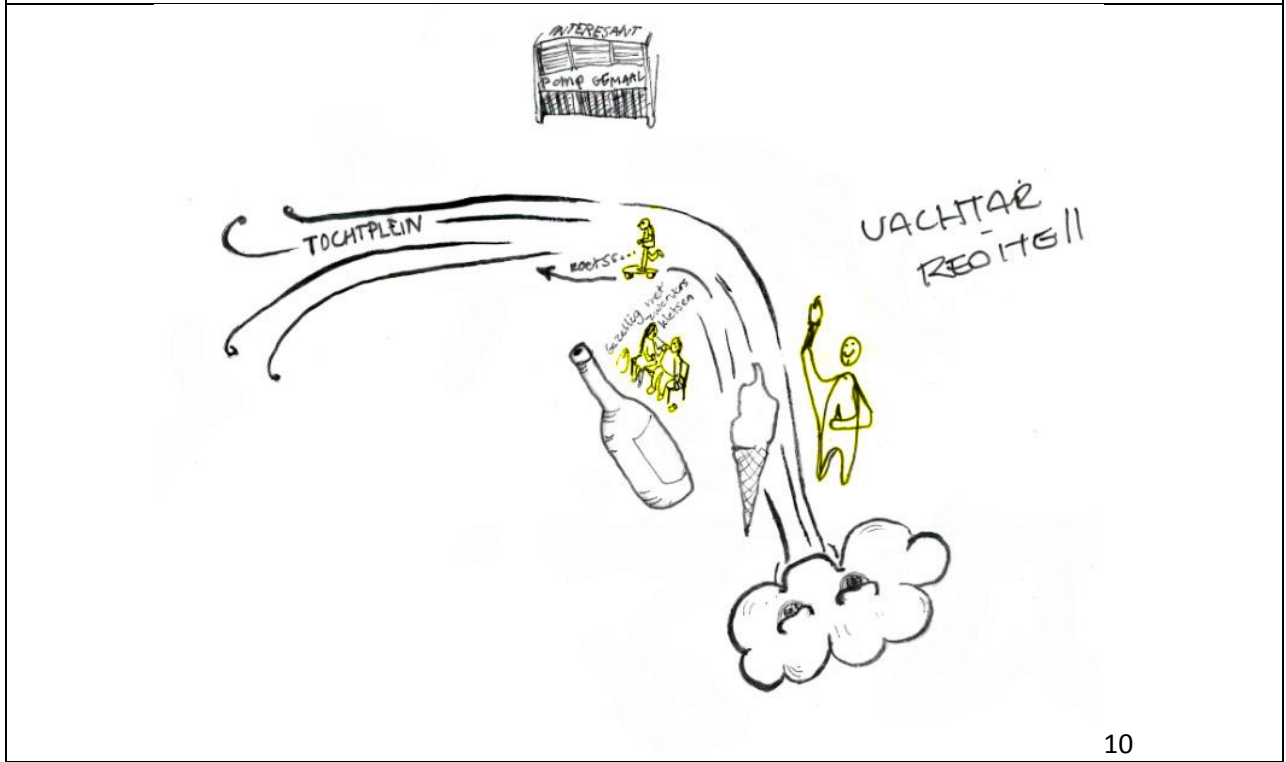




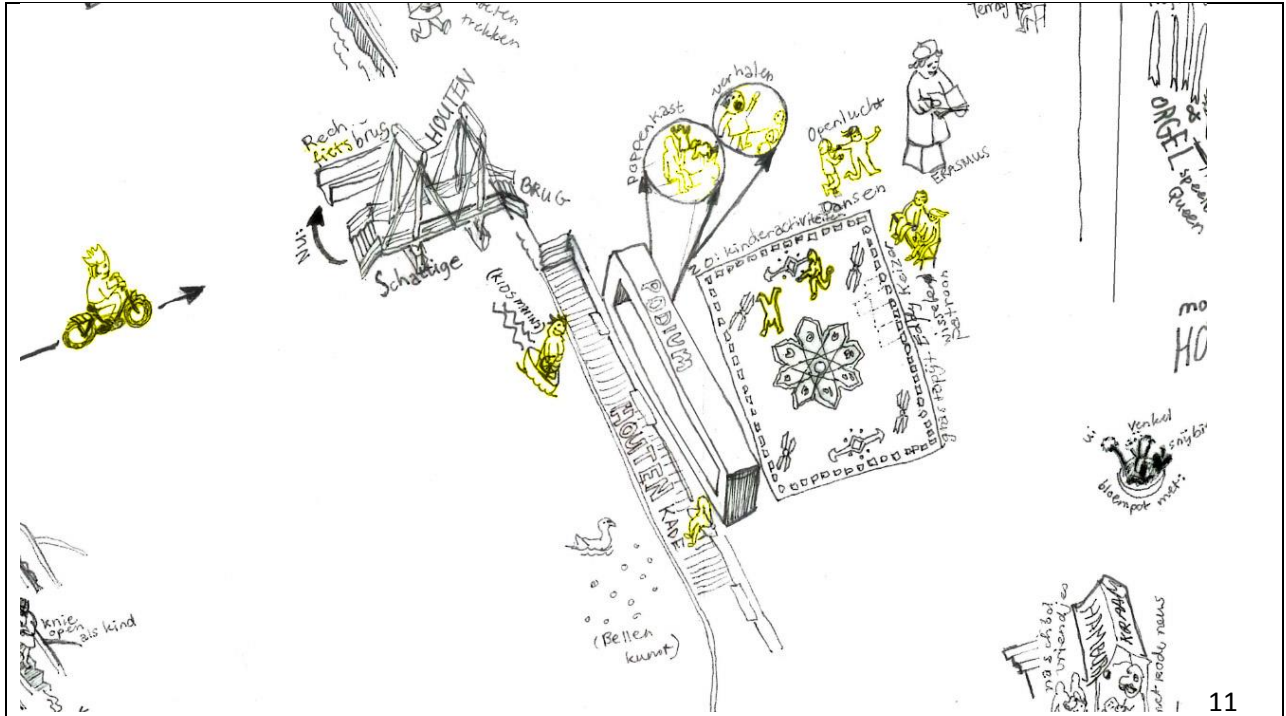




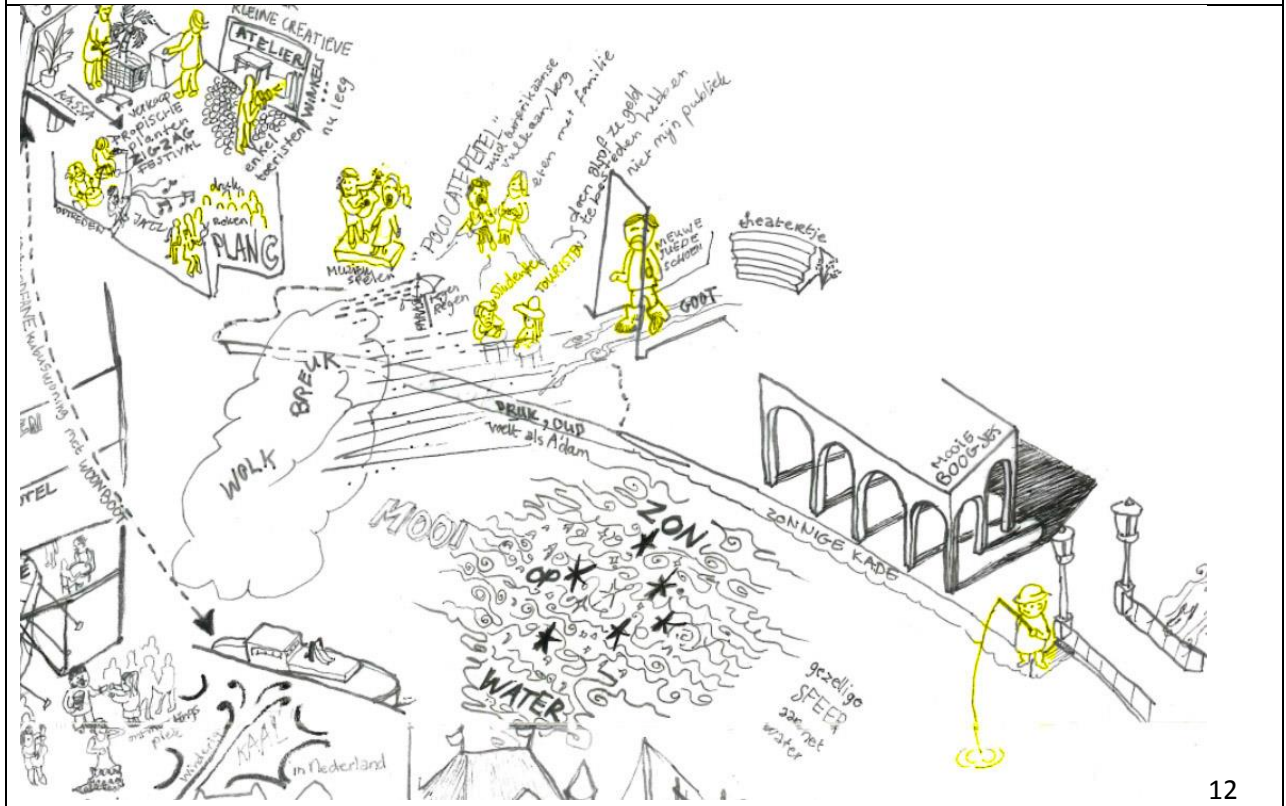
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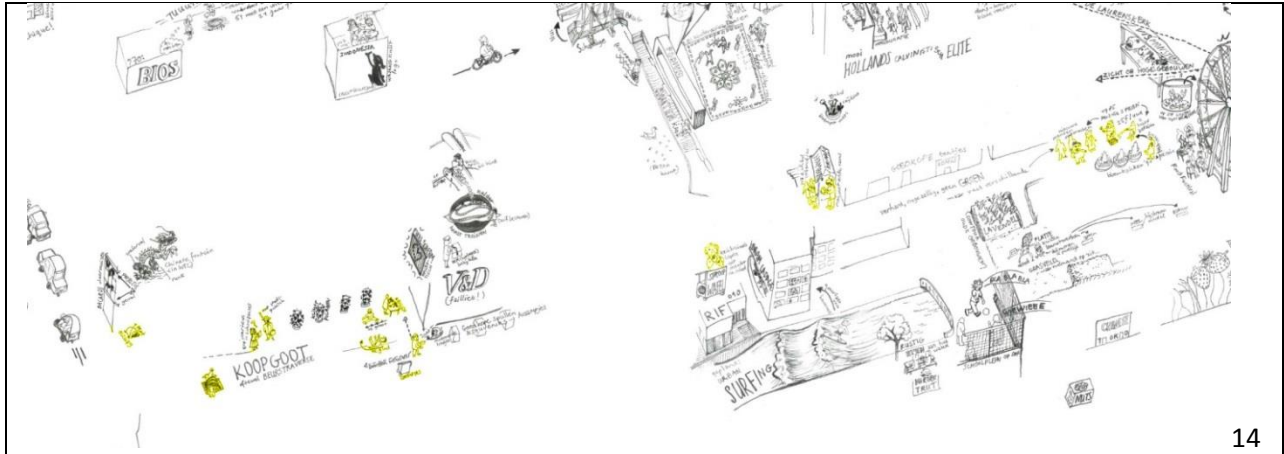
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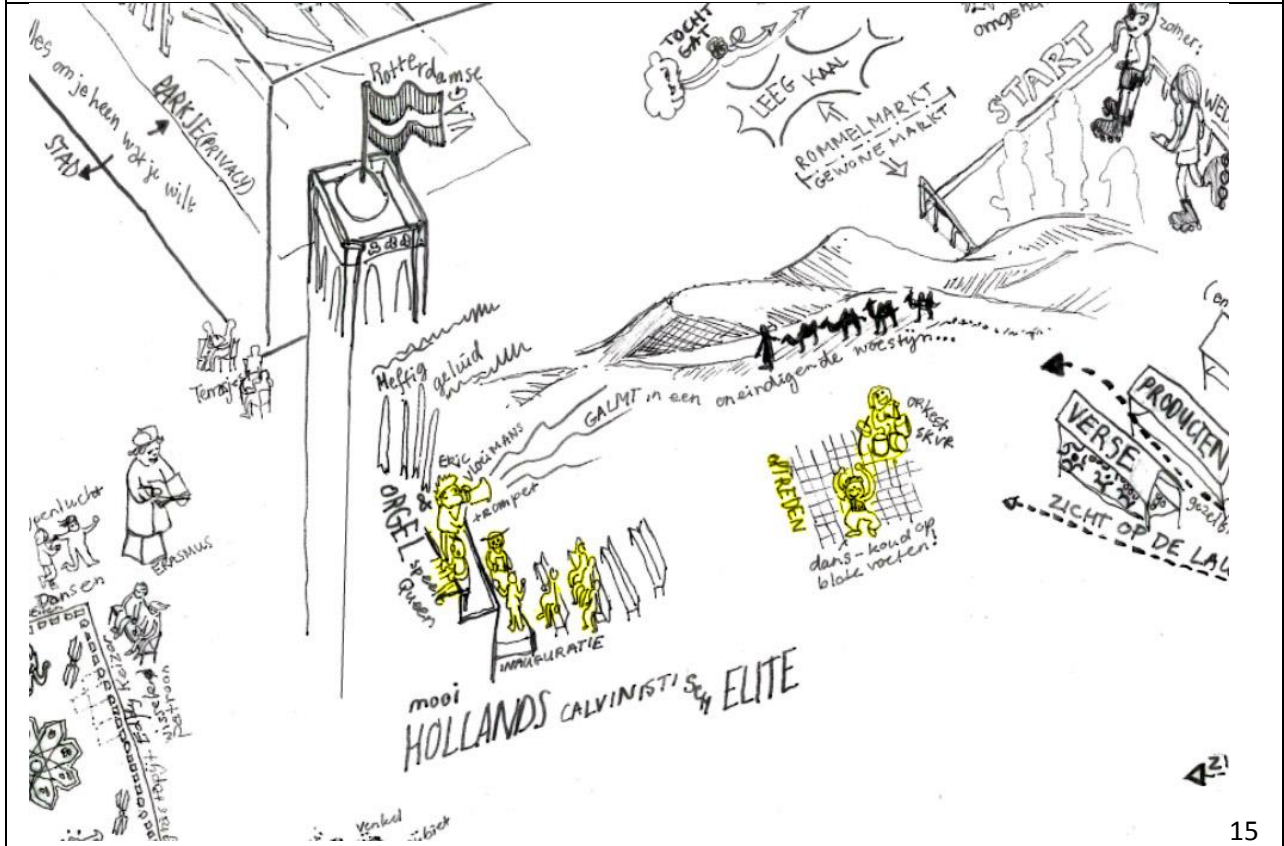
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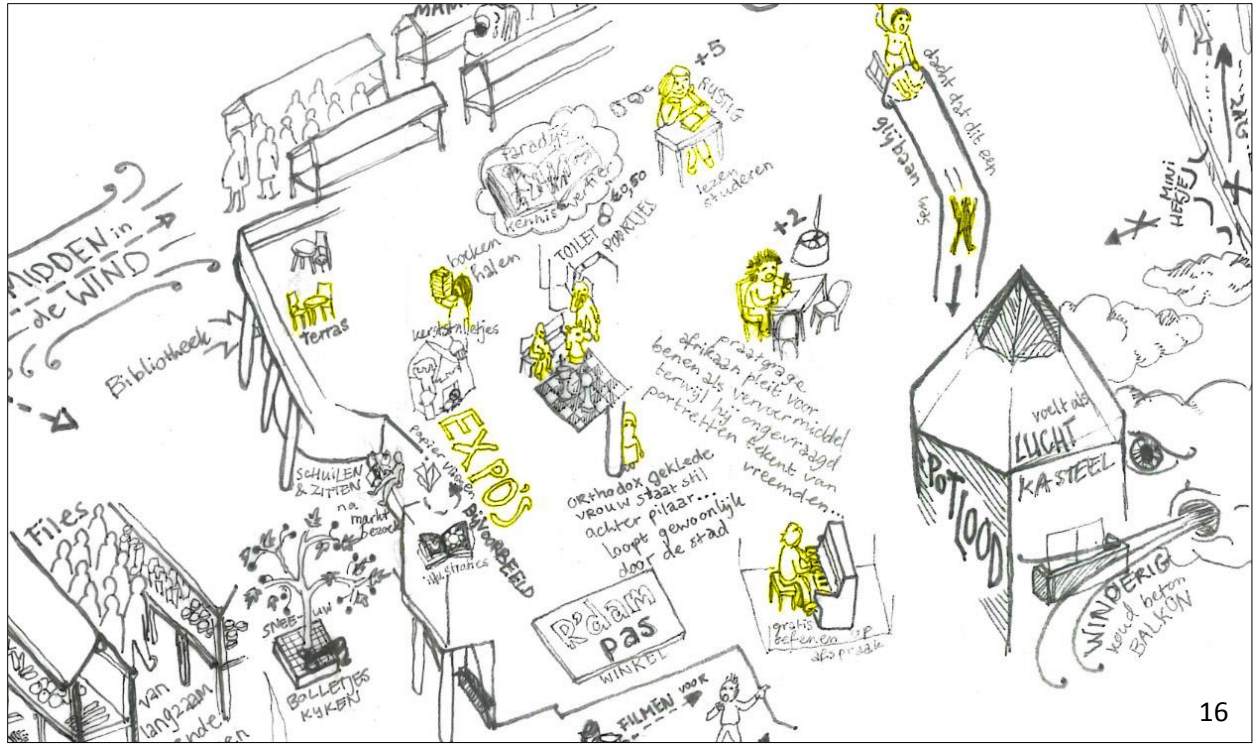
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6. Public in-between space (roads)

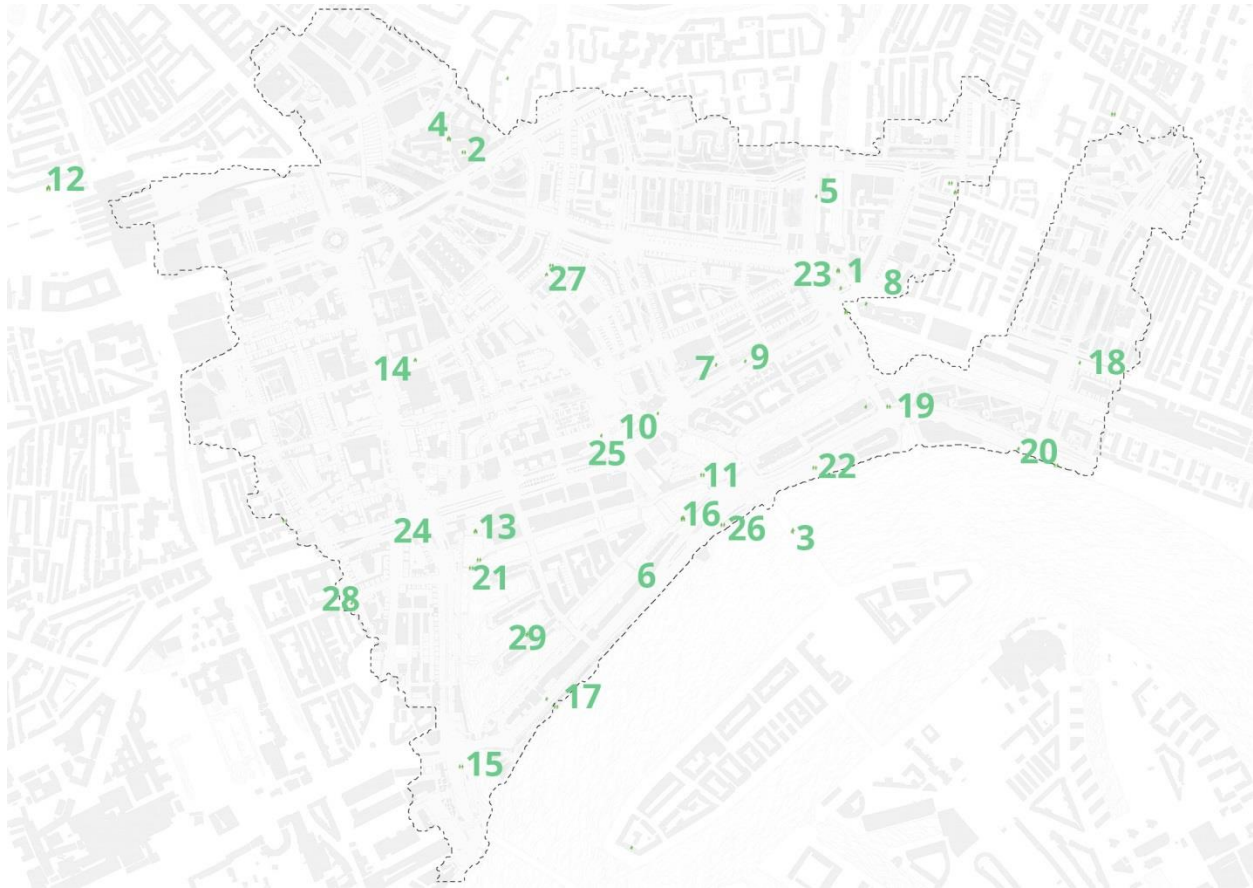


Figure 91 Public in-between spaces (own ill.).

In this section I'd like to show some examples of what people do not in clearly defined areas or centers, but in the spaces in between. Often these are parts of roads where people move between two destinations. The roads are often not equipped with many other facilities for use other than transport, but what happens during this transport and on these transport ways nonetheless seems to be an admirable number of experiences.

First of all, we need to differentiate the modes of motion in these areas, for these confine the experiences. In order of frequency were mentioned: bicycle (8) foot (7) skate (1) boat (rubber boat (2) or engined (3)) helicopter (4), camel (5) and cars (6).

Then the type of movement can be distinguished: moving in drift (just taking a walk, sometimes with dog (7)) or purposeful movement (to a certain, often repetitive destination (8)).

Although these two differentiations above were sometimes the main reason for people to remember them – an exceptional mode of transport or frequented routes- often these memories referred to something exceptionally happening – the interviewees encountered something extraordinary. These experiences ranged from: experiencing an atmosphere (countryside meadow feeling,(9), dark smelly

cave of a bear (10)), a special composition of the travel company and a special destination and purpose (activism with someone fancied (11)), encounter people (group of aggressive Moroccans which resulted in a confrontation (12), a sweet hobo (13), an intriguing noisy old skating man (14)), collisions (of bicycles (15), of engine vehicles – cars or trams – with bicycles (16), of cars in poles, of a car with seagull that got buried by spectator in the river(17)), falling (on top of a tramrails when cycling drunk (18)), breaking waters (in bathrobes on the road in close to the hospital(19)), heavy winds (20).

Besides these things that happened while the interviewee was in action on the roads, there were also some uses of these areas for static activities: loitering (with youthly friends (21)), eating (an ice-cream (22)), having a chat (with a local hobo (23), asking the way (24)), taking a seat (25), photographing (the scenery (26), a happening (19), waiting for something or somebody (the que in front of the coffee shop before Christmas (27), a lovers kiss (28)), spying (a potential boyfriend (29)).

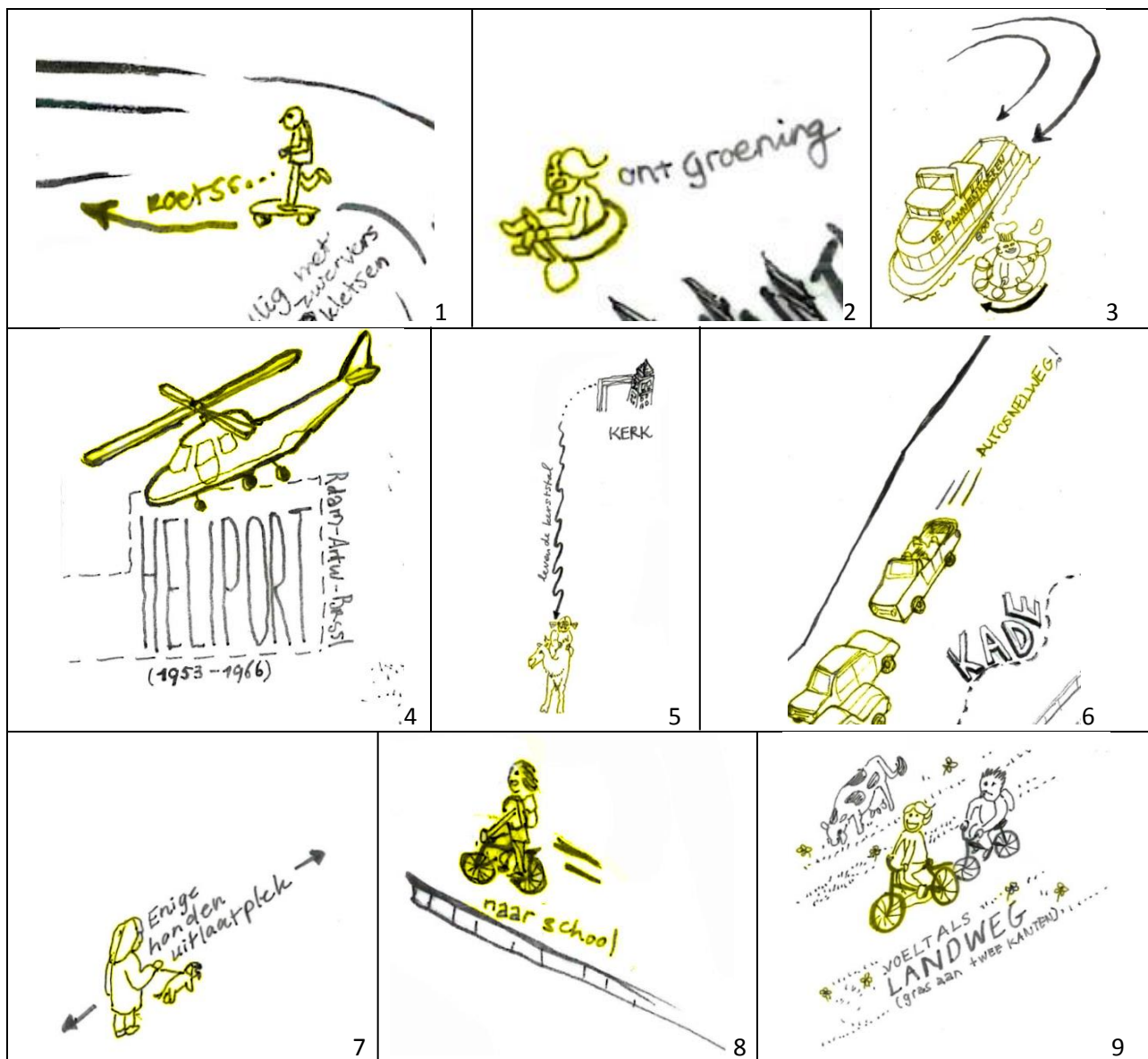
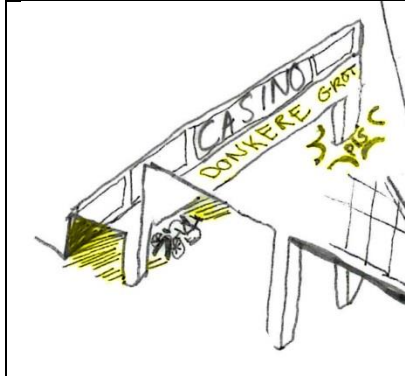
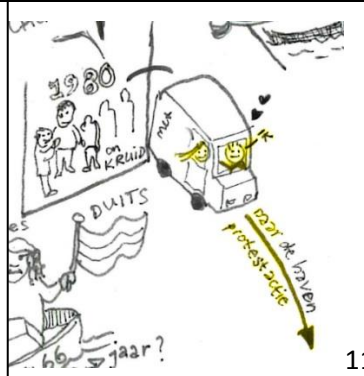


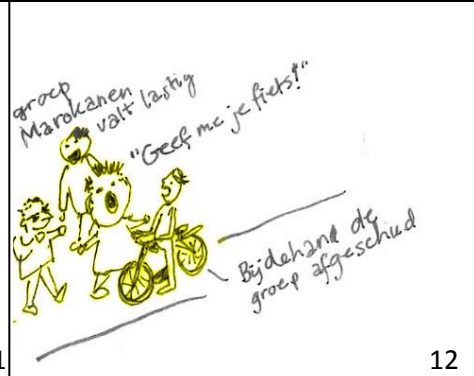
Figure 92 Examples of actions in public in-between space (own ill.).



10



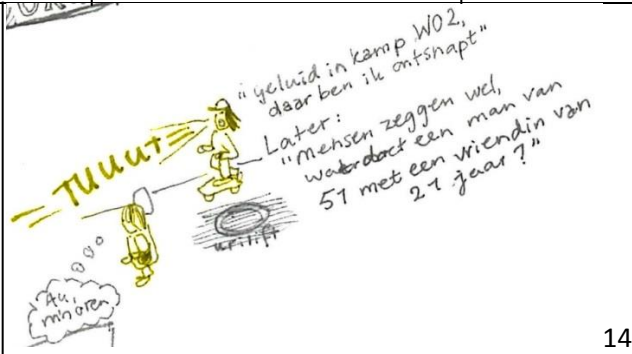
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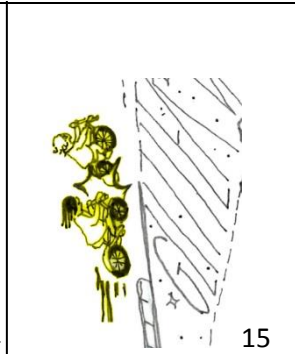
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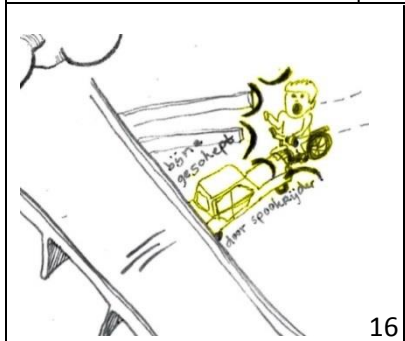
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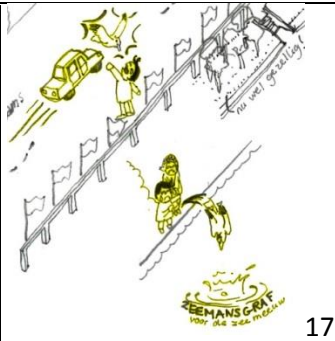
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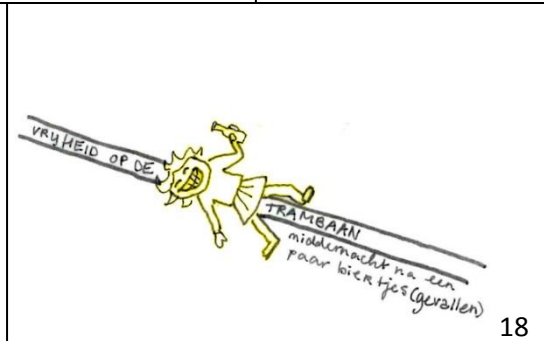
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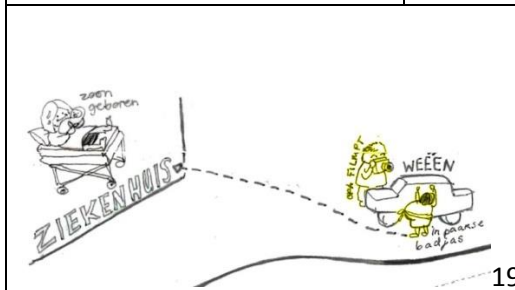
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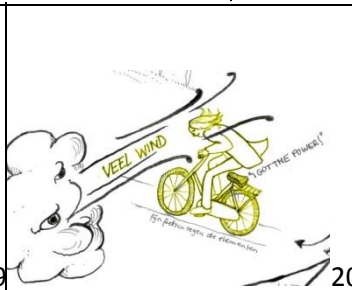
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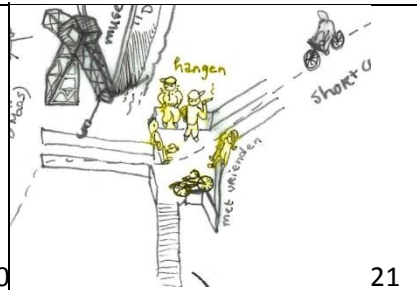
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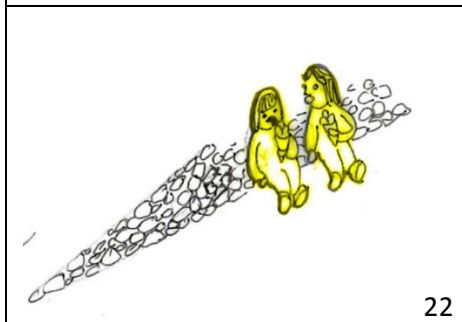
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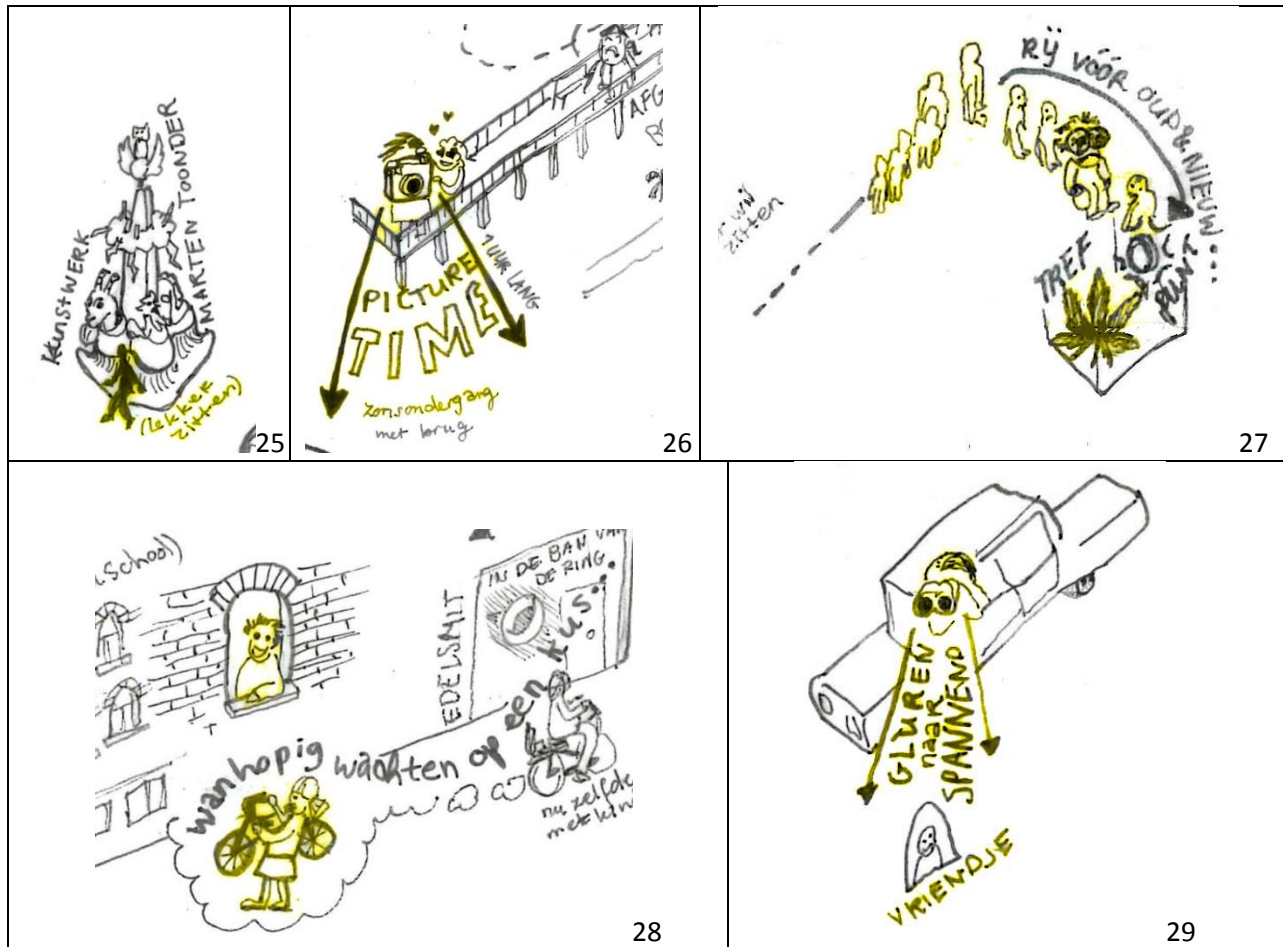
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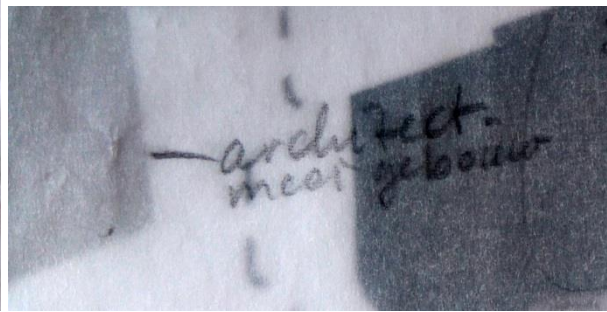
From these examples we can say that often more regular uses were remembered alone in motion, but acts in motion or more static activities on or at the side of roads where something special was happening – an encounter with the otherness of the public space – far outnumbered the statements of frequented routes. Besides this special public role of publicness of these places, there were some remarkable activities that could be considered private that took place in these public spaces – where the intent or effect of these acts was purely directed towards the individual that experienced it, uncensored or unaware by an awareness that one can be perceived by the other and that their acts might be unfavorable for or affecting their ‘public image’ (18). This can be expressed as a feeling of confidence or freedom that can exist in public spaces (either supported by an inwards confidence or oblivion, or reinforced by the ‘urban etiquette’ of not bothering others as mentioned in theory chapter of the public and/or the reassurance that there is a small chance you’ll meet these people ever again) .

FEELING 😊 😞

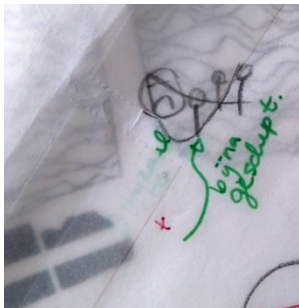
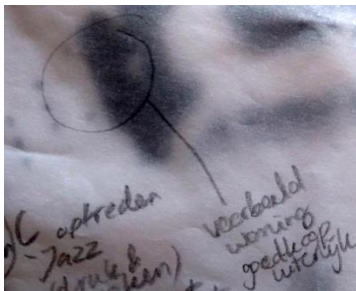
The relation described in these kinds of experiences, is characterized as a reaction with emotions or as a result of deliberating judgement and opinions related to sensual experiences.

Opinions and feelings (positive, negative).

Positive



Negative



FEELING

After discussing the primary acts of perceiving and doing, now I will elaborate on the mental reactions that some of these experiences and situations are accompanied with, governed by and expressed in. As mentioned earlier, there were two ways in which a mental reaction was expressed during the interviews: in emotion or judgement and in thought (association or improvement). The first of these reactions I will discuss here in a section where I describe the overarching governing element that make something memorable for the interviewee the *feeling* they had.

Like all other categories, this one seeks to answer from a perspective of the act of feeling:
How do people relate in feeling to 1) other people? 2) other aspects of the environment?

1. Are these complying with the division assumed? Levels of connection.
2. Do these have the assumed effects? Welcoming, hostile.

As establishes earlier, I had firstly divided the interview entries that involved a clear statement of emotion into a positive or a negative one. We will see it is often elements that were conceived as negative by someone on a specific place that was either conceived as positive by the same person on other places or by another person. Often the people used a similar vocabulary to express similar sentiments about people or places. I will discuss the emotional experiences in this section according to their connection: first those relating to mostly people, then those relating to places. As we have seen earlier there are also experiences of atmospheres that can be caused by the interplay of the elements in the whole scene (both attributed to humans and other elements). These will be introduced in both sections as they become interesting within these directions.

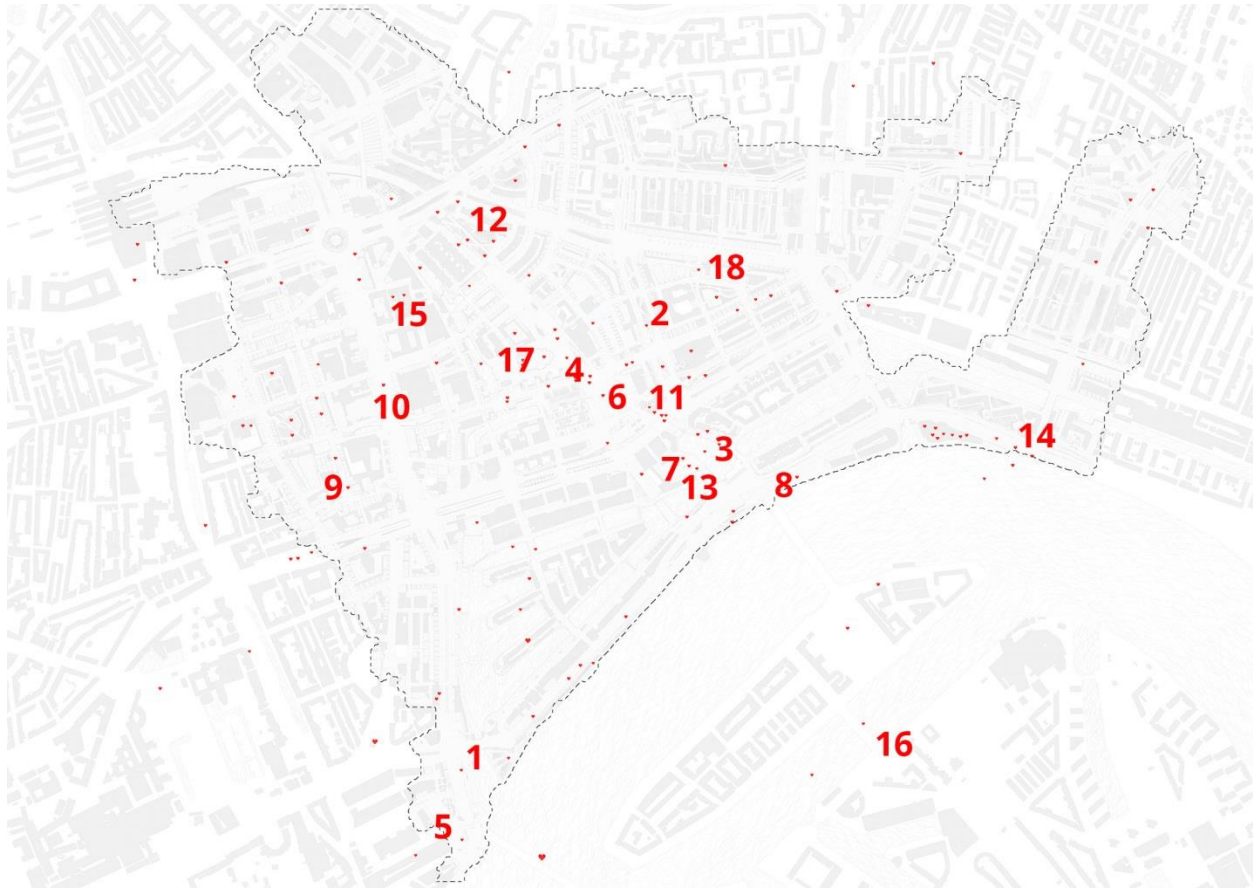


Figure 93 Emotional reactions (own ill.).

1. Emotional relations to other people

Clear emotional statements on the presence of other people in a positive way, accounted for experiences of: doing things together (discover areas, racing off the bridge and almost crashing into each other (1), playing hide and seek in unintended places (2), dancing, strolling over the market), the presence of others “gezelligheid” (around cafes (3) and on the market – people in a relaxed mode), the presence and awareness of a big variety of people (in shopping streets (4) and market) and relating to that the indirect presence of the other through an awareness and appreciation of the other by observing the effects of their activity that are visible in the city (a skate park, a communal garden on a fallow land (5) , the stories told by market vendors about characters in the recent history of Rotterdam (6)).

Statements of negative experiences caused by people were relating to: notions of places that demarcated the absence of people as “kaal, leeg, geen mensen, zielloos, sfeerloos” (7,8,10), a selective composition of public (“not my kind of people”) (3), too many people (not being able to move because of the crowd) (3,6), aggression expressed to them by others (robberies, “aso’s”, being spit at, aggression against street musicians (4)), certain people within the public that seek contact with personal agendas (“doneermensen” (9)) and opposed to the positive marks people leave are the negatively perceived marks (littering, the smell of piss (11)).

2. Emotional relations to spaces and elements of these and in these.

There were different experiences that related to the physical state of the space perceived as negative or positive, besides the one distinguished as marks of human presence, we could arrange them according to the scale of the elements that they relate to: talking about the perception of bigger areas, talking about specific sensual experiences (talking about specific qualities or characteristics of the places or the elements within them).

When reflecting on whole areas, the interviewees gave as their range of positive experiences: gezellig, atmospheric, beautiful (3). Negative annotations of whole areas were: empty, inhospitable (7,8), emotionless, sad, small, scary (12) and soulless.

These places were often accompanied by sensual experiences as well: smell (only mentioned was the bad smell of piss(11)), surface (slippery, dirty full of mashed food (6), bumpy and the presence of rails which is bad for skating), wind (sheltered places (13) and enjoying the wind vs too windy (14)), color (dark smelly places (11) and old-fashioned 70's colors vs light glass roofs (15) and golden domes), temperature (cold stone floor to perform a dance barefooted in church vs enjoying the heat of the sun (3)), sight (repulsive and cheap facades vs the view of Rotterdam's building and its harbor life(16)) and sound (the noise of student associations or a tram remise or the intense sound of an organ in church vs the inspiring sound of an echoing trumpet in the same church(17)). Often beauty was referred to in relation to objects and elements (nice bridge, bridge elements, pillar (3), and wild planters). Positive surprises were expressed as: funny alley, surprising contrasts, playing with temporary extraordinary elements (2), discovering hidden public parks, associated names of streets (18) or appearances of objects with a nonexistent reality.

3. Personal events

These relate to things that happened to the interviewee. Some negative ones involved: (near) accidents, ruining new shoes in heavy rains (3), taking injections, being excluded from participation. Positive ones were often accounts of nostalgia: going on set times to do some enjoyable act often with people that they like the company of (being allowed to buy a book for 1 gulden on the flea market, going to the forest for leisure with the family, going sailing on the lake with youngsters).

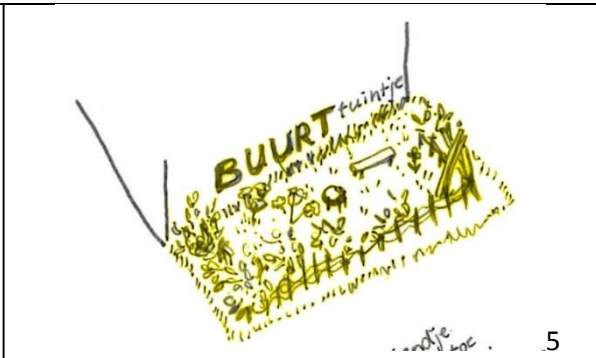
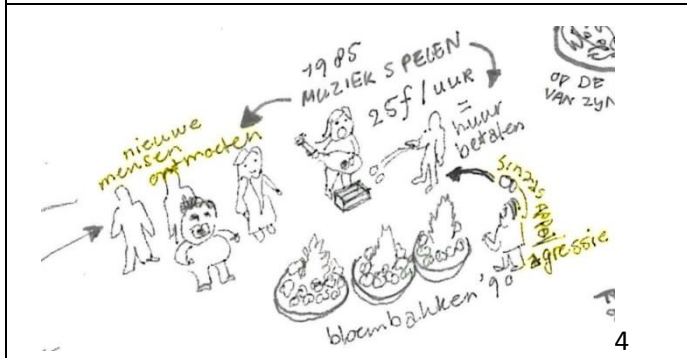
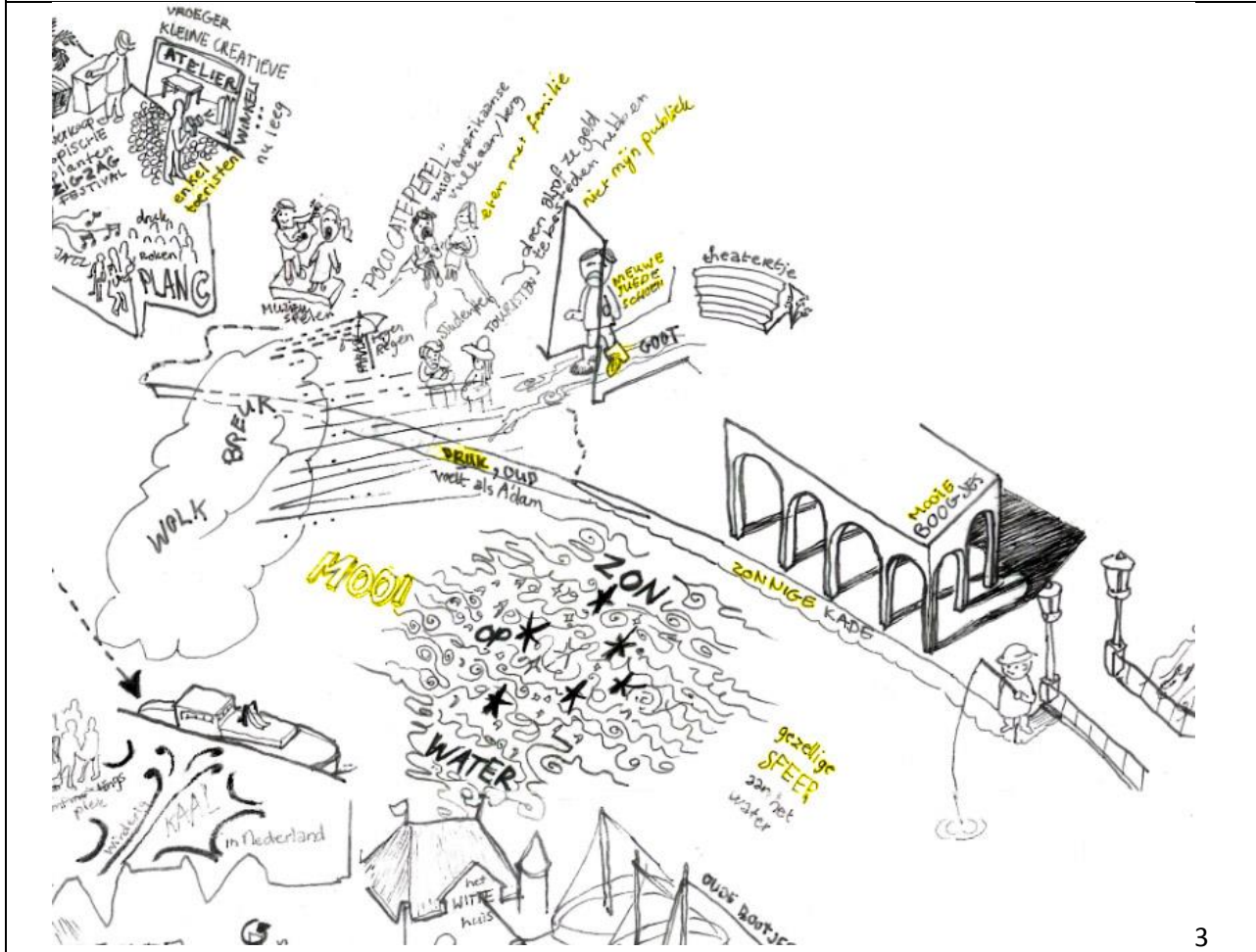
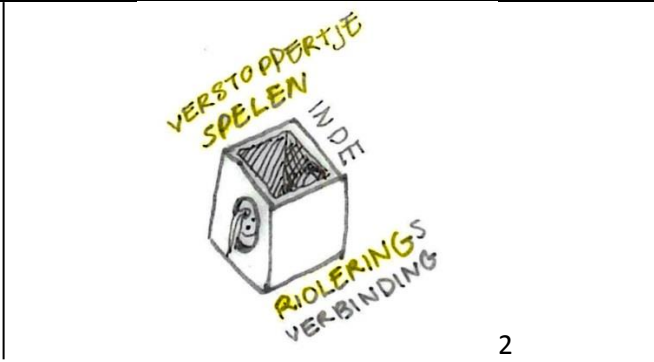
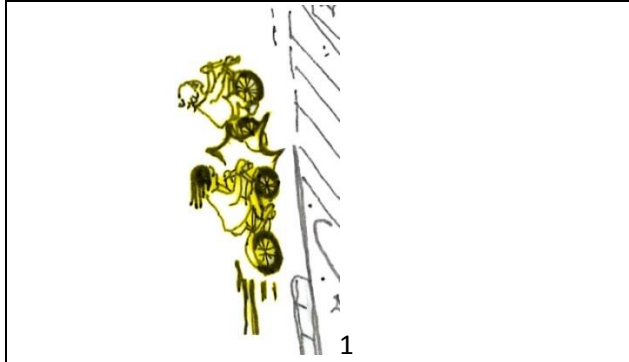
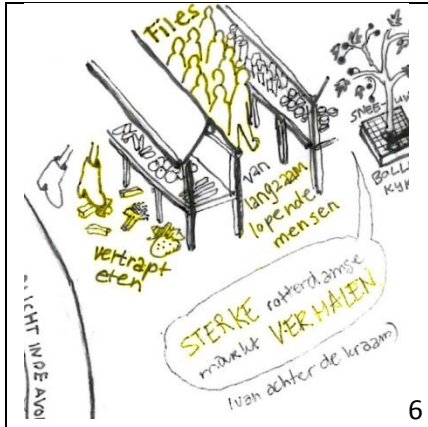


Figure 94 Examples of emotional experiences (own ill.).



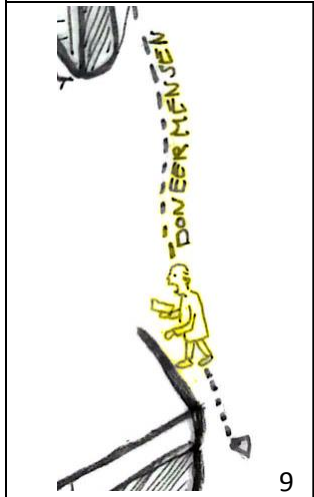
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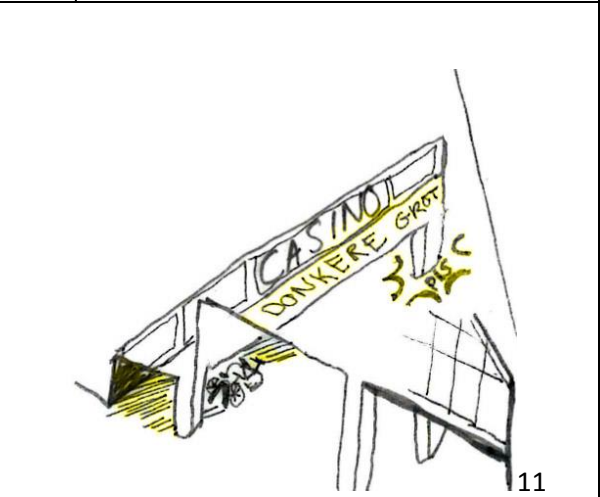
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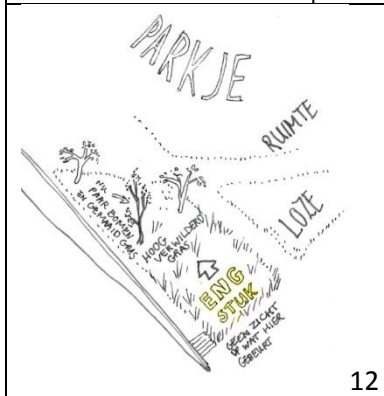
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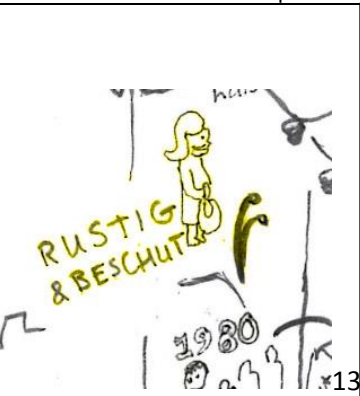
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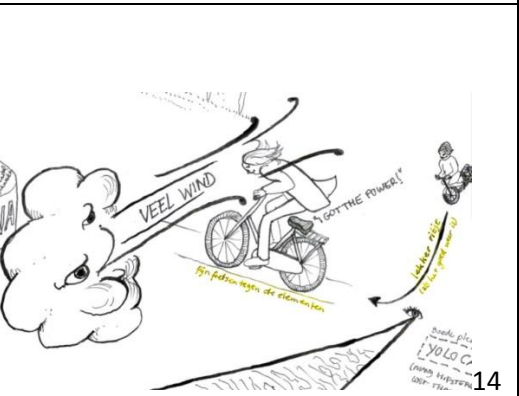
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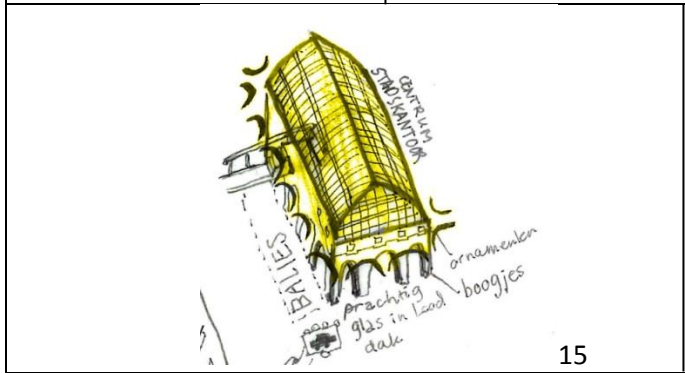
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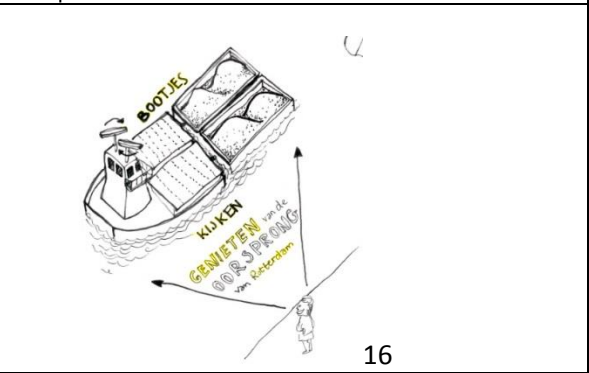
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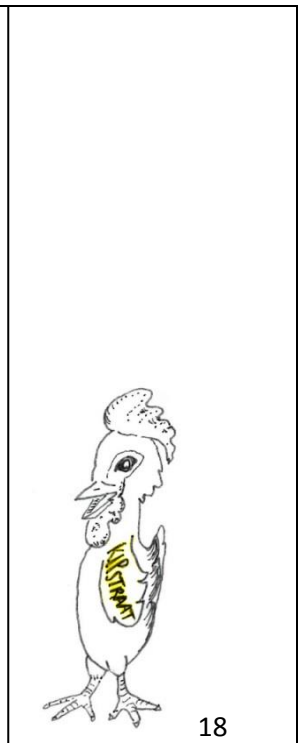
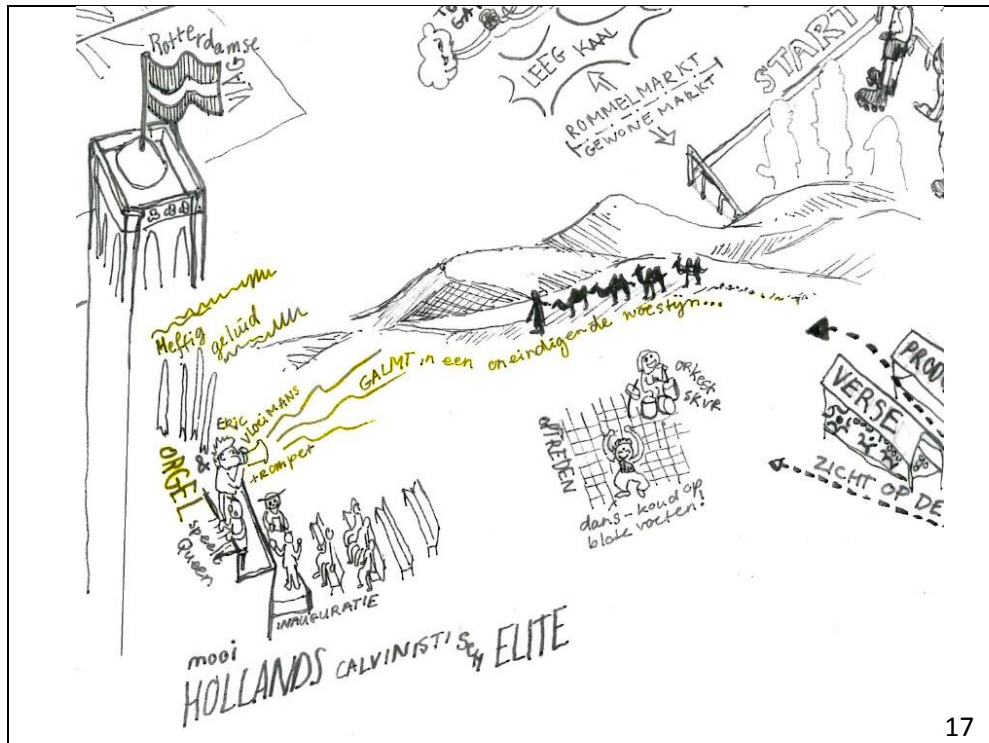
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16



THINK 

The relation in these kinds of experiences with the interviewee, is one that describes a non-existing (future, past or imaginary) reality triggered by the observed environment. It is again a reaction of the brain to the environment, but this time not characterized by judgement or feelings, but by imagination.

Associations and ideas (including suggested improvements).

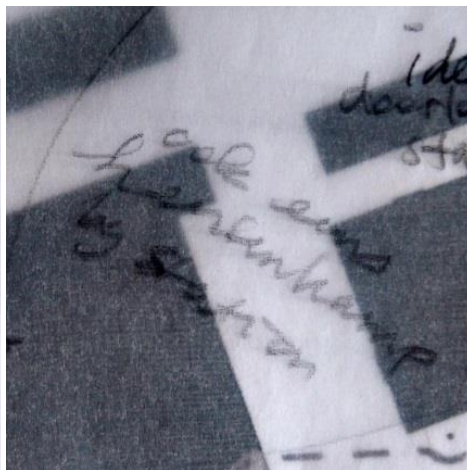
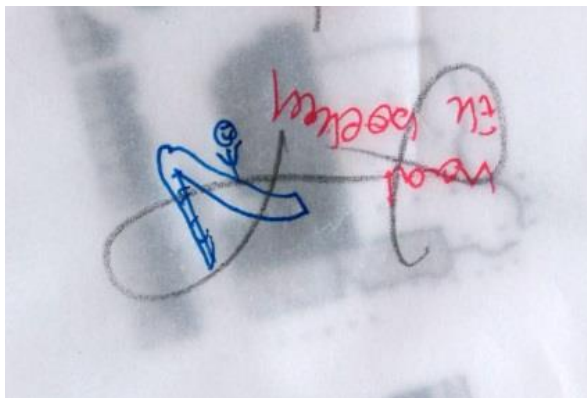
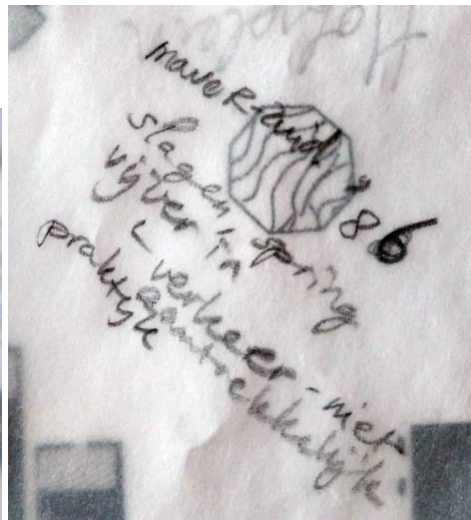
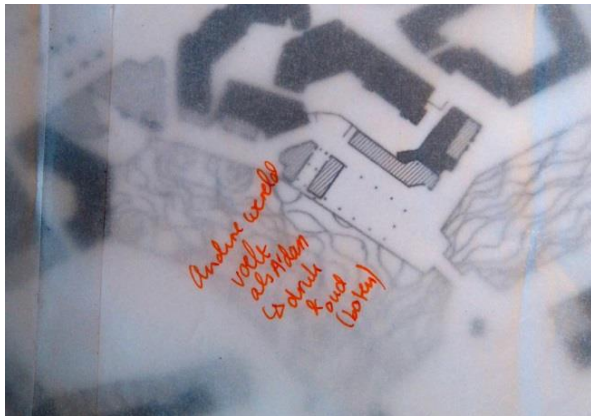
Examples of used phrases:

“Looks like/ makes me think of ...”

“I call this ...”

“I always thought ...”

“This could be ...”



THINKING

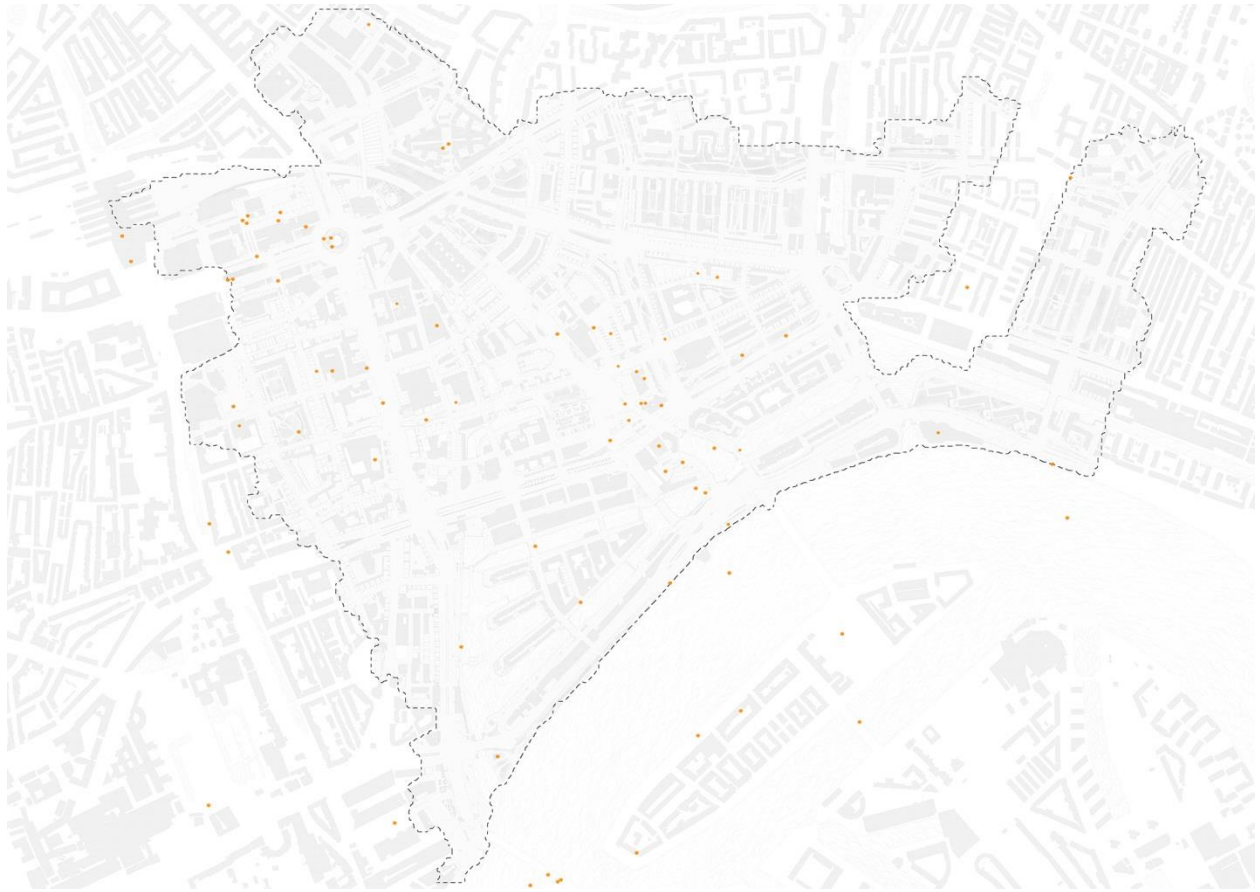


Figure 95 Spots with memories related to thinking (own ill.).

Now that the interview responses governed by seeing, doing and feeling are covered, I will go into detail to a special way of perceiving an experience: through an act of thinking.

How do people relate in thinking to 1) other people 2) other aspects of the environment?

1. Are these complying with the division assumed? Levels of connection.
2. Do these have the assumed effects? Welcoming, hostile.

As mentioned earlier, these experiences governed by thinking were expressed as associations and ideas (including suggested improvements). These are all thoughts provoked by the environment that talk about something that is not currently present at that place. I will distinguish here connections to the past, to an alternative present, to a future or to a reality that cannot become real, within the connections that are made towards: places, uses, forms, people, events and names.

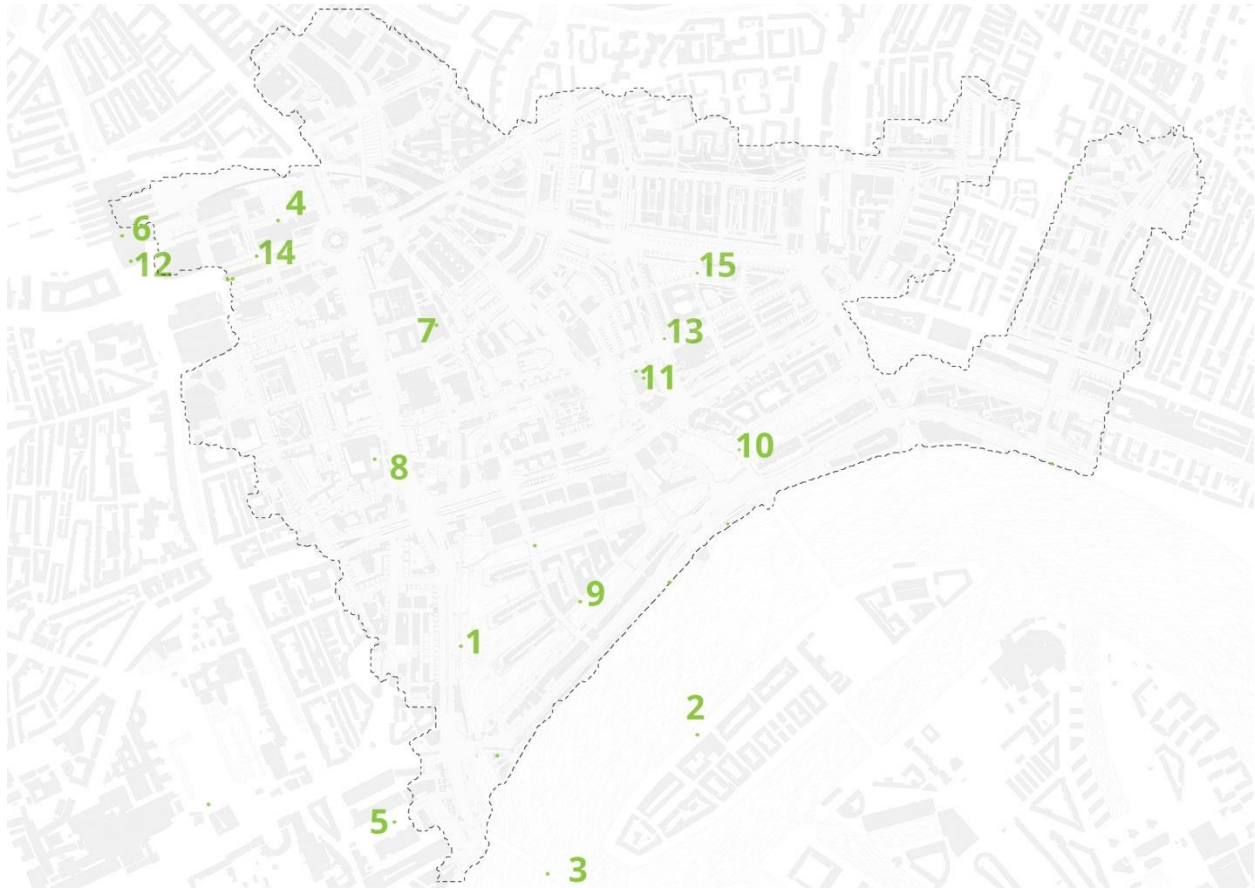


Figure 96 Memories of thinking (own ill.).

Association with a different place: atmosphere is similar to another place (lignite Berlin (1), Spanish boulevard and square, Amsterdam crowds, Manhattan streets, countryside road, French bridge), place refers to another place by connection of what has happened there (the tree depot, the activity and use of the rivers in Surinam (2), the water activity in the current harbor of Rotterdam), the place represents a bigger area with stories (bridge or one old harbor over river (3) represents stories in the whole “Rotterdam Zuid”).

Association with different use: nostalgic memories of another (exceptional or much different from current) setup and use of spaces (jazz bar, cinemas, flea market, covered market under train track, circus, kermis, deer camp (4), old temporary theatre, beach, salmon harbor (5), gas plant, kraakpand, helicopter pad, play village, fields of wheat and other vegetables, the old central station and the artistic joke (6), nun school), shape and material provide for ideas of different use (covered old train bridge as climbing mountain, artwork as skating ramp, half demolished building as a Shakespearian theatre (7)), provocative futures (once planned high-rise hotel on top of heritage).

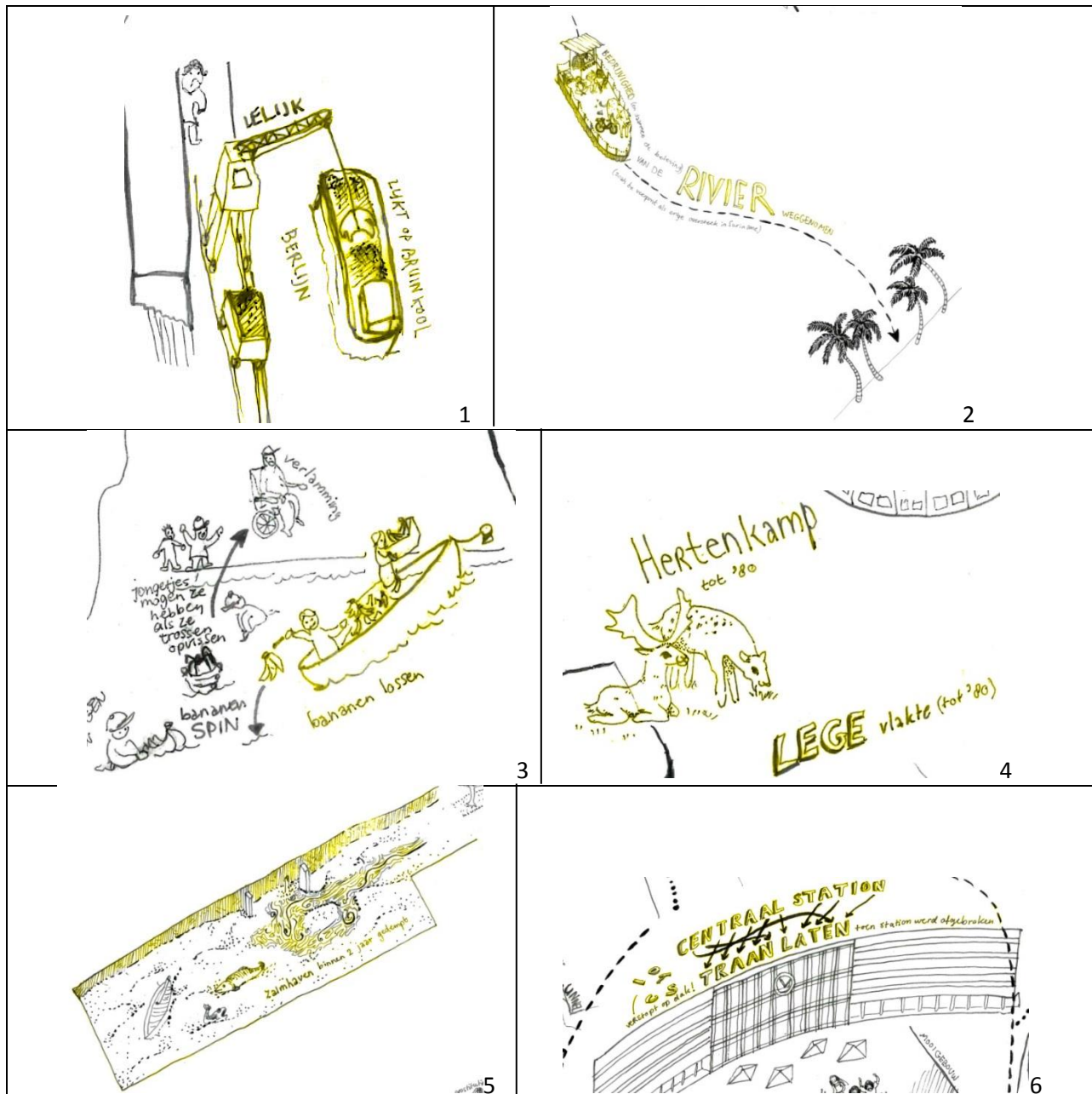
Association with form: these associations were all things that could not be a reality in itself - art (Kabouter Buttplug, Giraffe, Worms, Cornucopia, Ship (8)), bridges (Scorpion and Ibis (9), Swan and Harp), boat (new high-rise building), layout of buildings (courtyard), movement and material (jelly fish

(10)), ventilation pipes (slides, intestines (11)), material and shape (CS kapsalon (12), Koopgoot). Rotterdam has a reputation of naming their iconic elements in the tradition of their associative forms.

Association with people: specific people (boat name referring to German teacher, harbor to someone that has a husband that became paralyzed due to events there in the past (3)), to a group of people and their life (a boat with t-shirts to the boat life, a money tree in an Italian restaurant with reputation to mafia life in Rotterdam (13), a small cage with carps in Chinese restaurants).

Association with events: old bank with financial crisis, idea to create art from windy areas (14).

Association with names: boat name to people, street to past potential use for animals (15).



Appendix F Observation

Appendix F.1 Setup

The location was filmed for the duration of one hour 16.00-17.00 on two sides that can be perceived from one viewpoint: Westewagenstraat (shopping mall side) and the Westewagenhoven (waterside). The areas and points of observation with their visual range are marked in the images below.

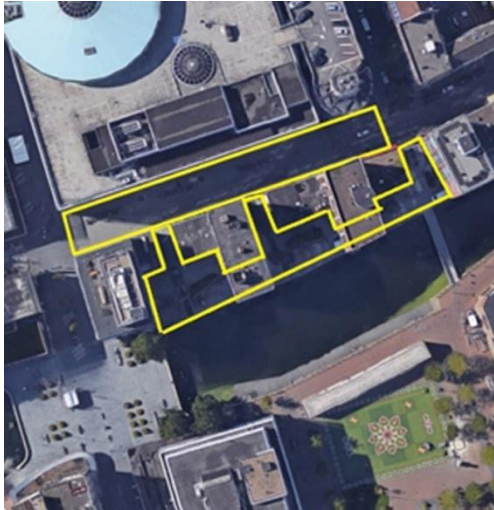


Figure 98 Two sides of location (based on Google Maps).

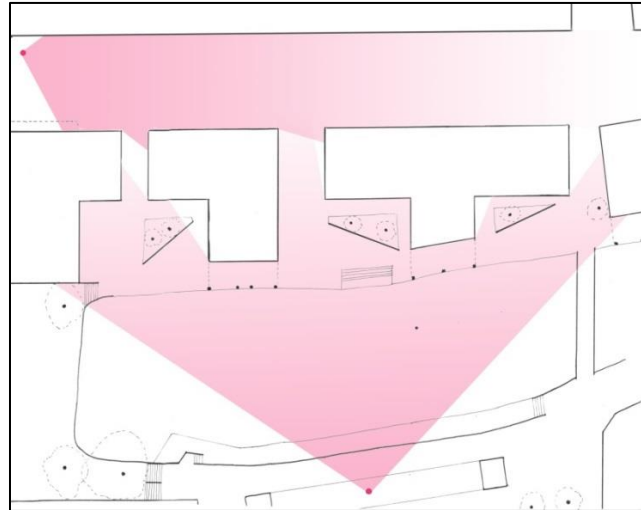


Figure 99 The visual range from the spots of observation (own ill.).

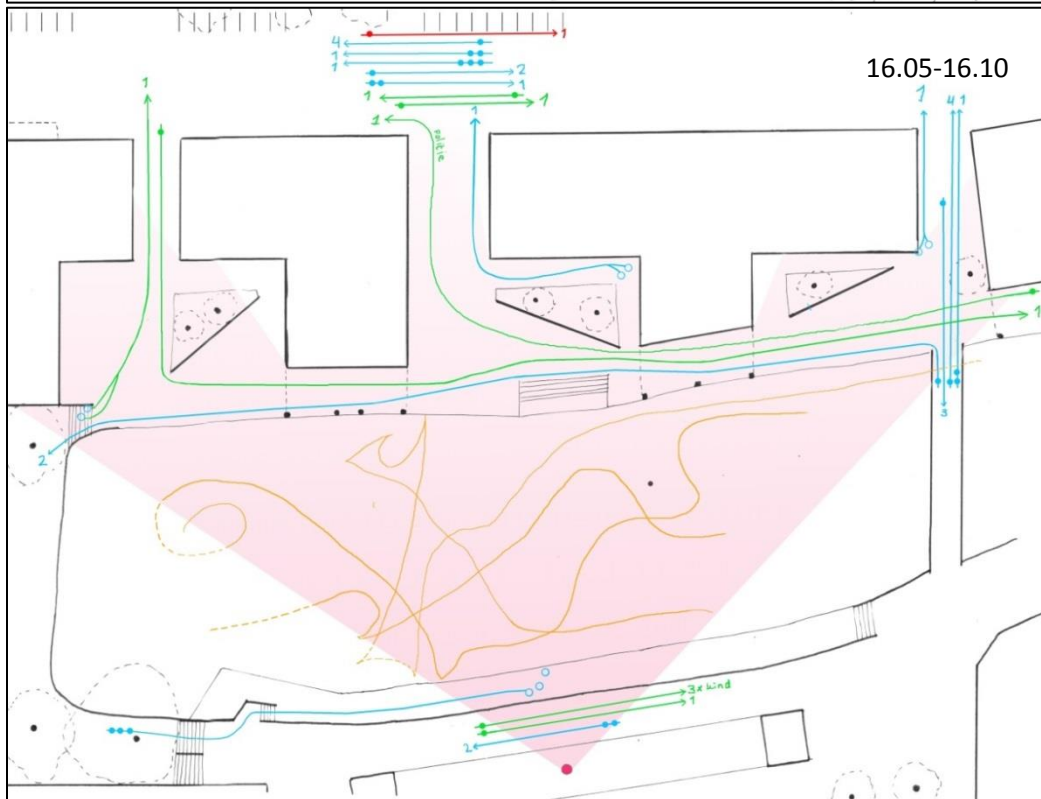
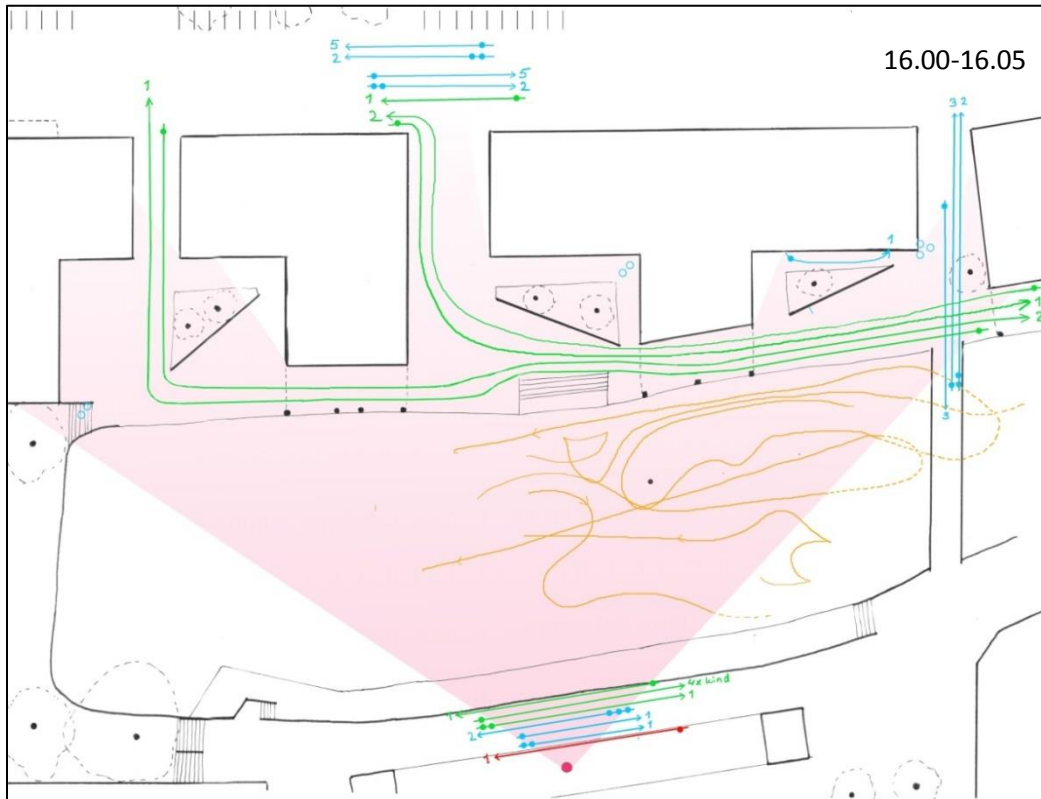
This film is then transcribed to drawings on a map of the location that contain the elements of movement and static presence in intervals of 5 minutes. This interval is chosen for it proved to produce still readable drawings. This data will be separated in order to analyze the role of aspects of the location on behavior, ultimately answering the questions.

Appendix F.2 Limitations

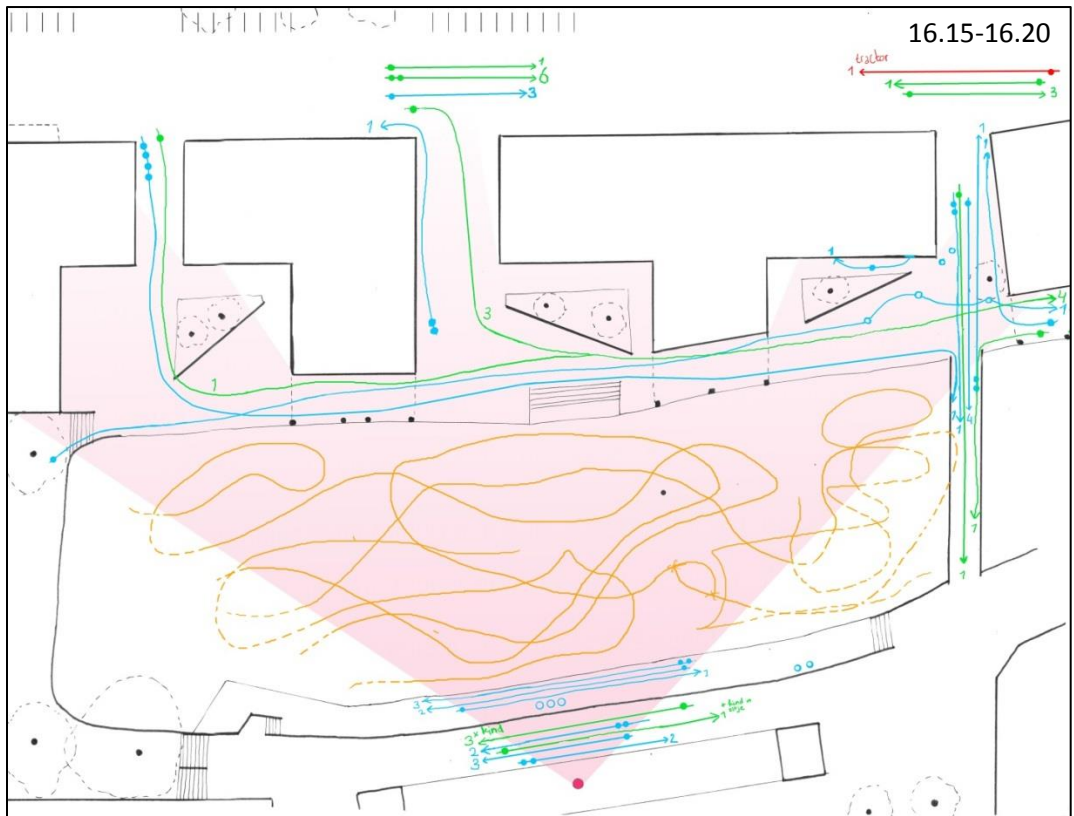
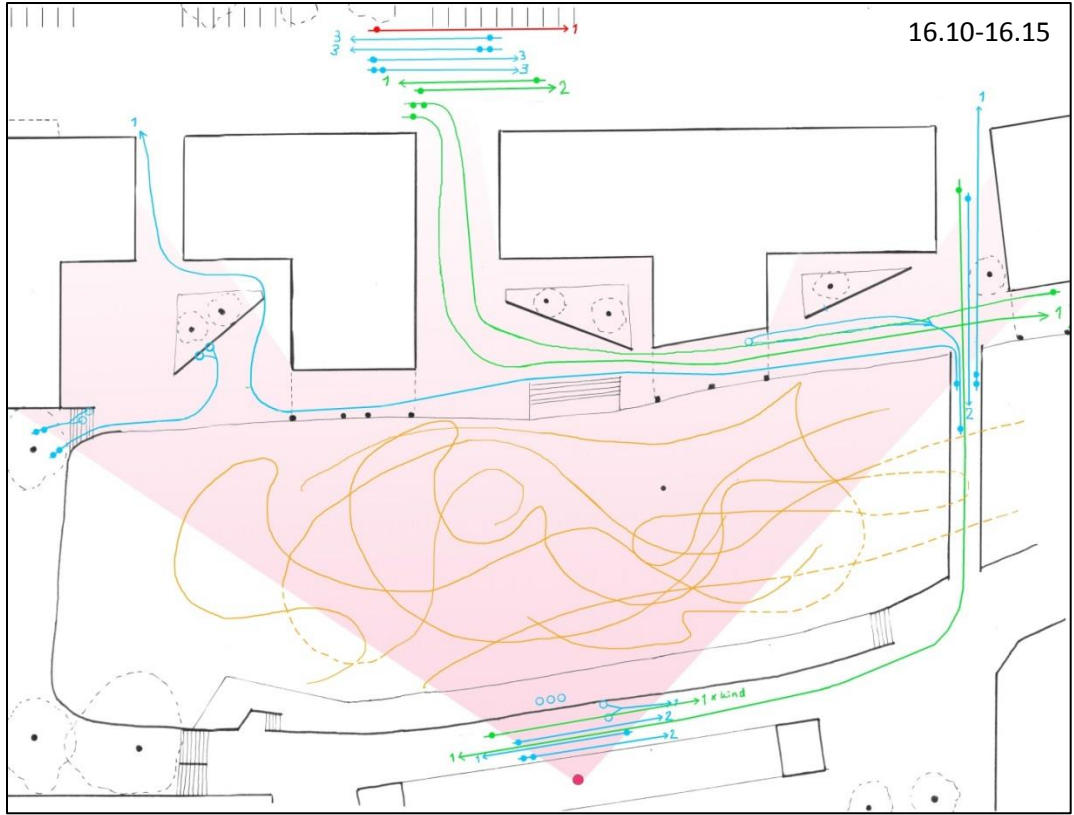
It should be taken into account that during every hour of the year something different can happen and it is even very likely that the patterns and numbers of use vary greatly according to the time of the day, the day of the week, the season and weather conditions. The samples taken for this observation take place in summer with good weather, so a minimal influence of weather can be expected. Because of this condition and many people having summer holidays, I expect there will be more people wandering around compared to a colder season, bad weather and working days. The samples were taken on weekdays between 16.00-17.00, which makes me expect a crowd that has just been in the shopping district or is just going towards it and that on these nice and warm days may spend some time somewhere to repose after their shopping experience. Although these limitations of the samples are considerable, I expect that the effects of these are limited to the number of people present in the scene and slightly to the static activities that they perform. The patterns and types of uses that can be observed during the sample will be present on other times as well.

In order not to influence the public (so that they feel observed and act upon that), to observe the bottom location (Westewagenhoven) I was sitting on a bench on the podium while eating and on the top location (Westewagenstraat) on a bicycle lock spot with a bag and acting as if I was reading while waiting for someone in this busy shopping area. Unlike my expectations, this half under cover mode was quite effective: only once a man asked me what I was doing and that so in an unaggressive manner. In the videos you can see that people observe me as part of the public realm, but my presence with a device does not alarm them or raise a different behavior. Probably people are much more used to this sight these days. During the observations I saw a few other people with tablets.

Appendix F.3 Westewagenhoven 10-08-2016 16.00-17.00



- one car
- one two-wheeled vehicle
- two pedestrians together
- one boat
- 1 time
- 3 times
- 7 times
- 1 time



Daily uses per vehicle – movement patterns



Figure 100 Still from the observation of Westewagenhoven (own ill.).

Boat

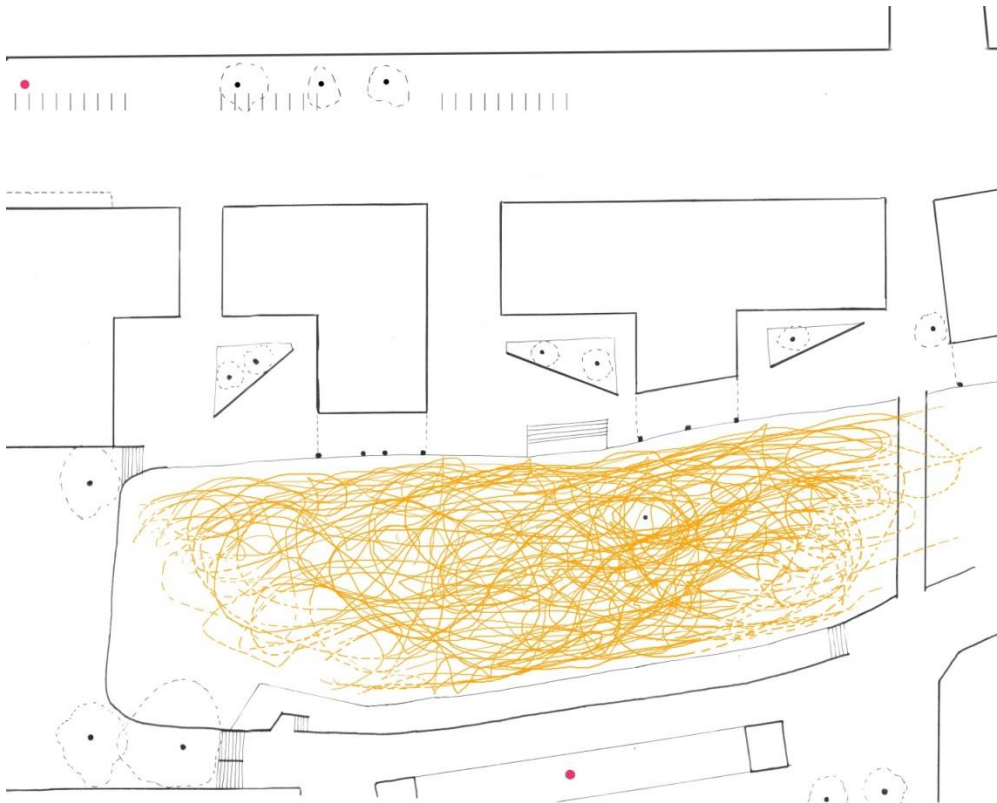


Figure 101 Observation of paths by boats (own ill.).

The water was the scene of use by boats and birds. It was a stage of a dance of hitting and not hitting others, players creating their own rules of the game: wiggling, observing swans, stalking other boats, swans or grebes, passing others, racing, dodging obstacles (a pilon), routing or just mindless steering

discovering the limits of the vehicle, the water scene, the other water participants and their own skills of maneuvering a boat and imagination to come up with new rules and activities.

The water boat renting venue, specially designed as a leisure facility based on play, is an interesting example of (almost) free play⁴¹: the activities described were all the result of the players themselves and the play that they set up. In return for money they gained access for a limited time to a boat, water with borders and one set pillar. This limited setting invited people to shape and order their activities with the boat and it was observed that after the initial discoveries on how to maneuver the boat, gradually people started to seek new challenges, which often involved the other participants that occupied the water.

On the patterns that they made, we can further conclude that the limits of their vehicle decided this: the pillar and the quay were areas of specific attention to either avoid or to hit and where the water becomes narrower routes tend to overlap (limited options).

Two wheeled traffic

Movement frequency

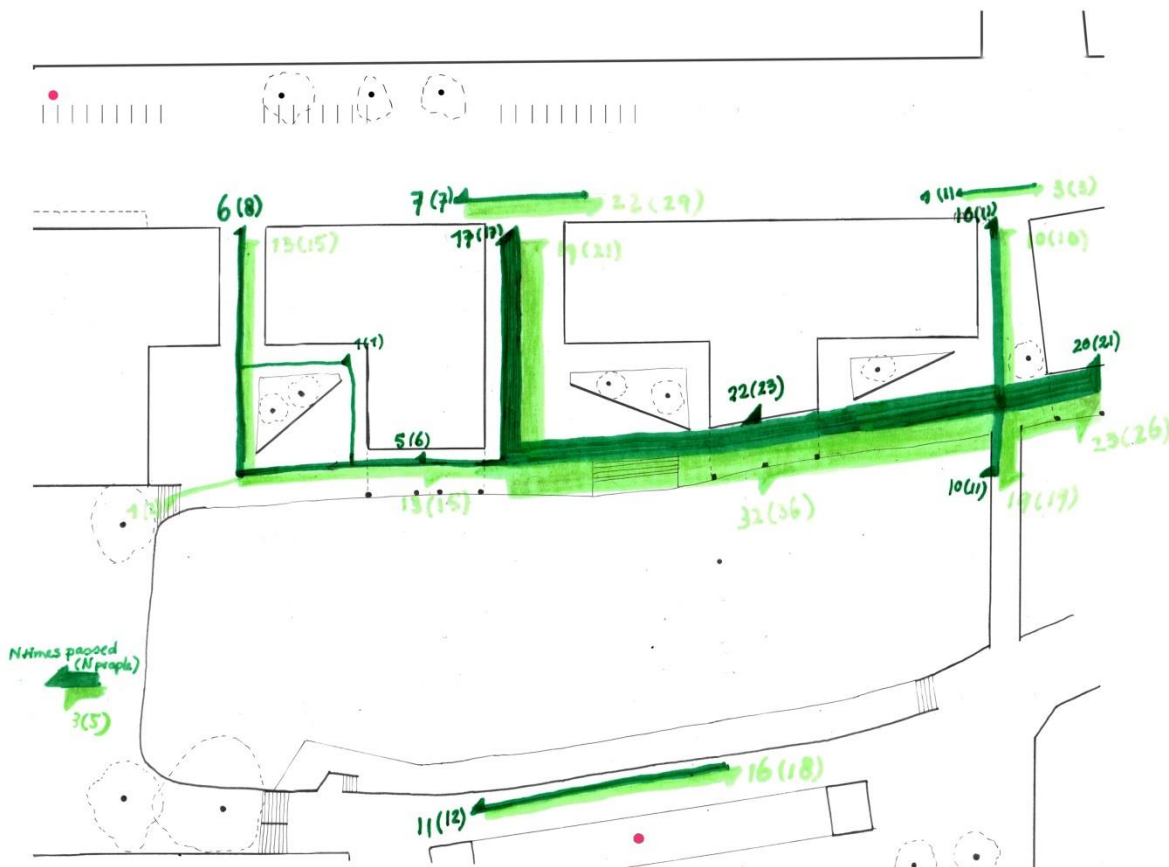


Figure 102 Observation of total routes taken by two wheeled traffic (own ill.).

⁴¹ See elaboration on types of play in Chapter 3.

The frequencies of use in movement in different areas (and their direction), are shown in fig 69. We can see that the first street to the left is not used as much as the second street and the waterfront. As cyclists have to go up a stairs and the angle they have to make because of the planters and the narrowness of the street itself, we can understand the first street on the left not to be so attractive to cycle trough. The relatively big line of cyclists passing the waterline, could suggest that many of the cyclist prefer this route over the parallel street (Westewagenstraat) on top. We will see in the observation of that street, that that street is indeed much busier, but is also not visually attractive as the route by the water.

Static activity



Figure 103 The cases of static activities observed from people on two wheeled traffic (own ill.).

From all the activities of two wheeled traffic in static position that were noted, we can conclude cyclists (the only vehicles that stopped) rarely stop. The occasions that they did stop, were because of: parking facility (lantern pole); leaning on a bridge railing, enjoying the view and waiting for fellow cyclist; when struck by a fascinating view (in the reflective facade). All of these show different preconditions elements of the environment can have for cyclists use.

3.3.1.3 Foot

Movement frequency

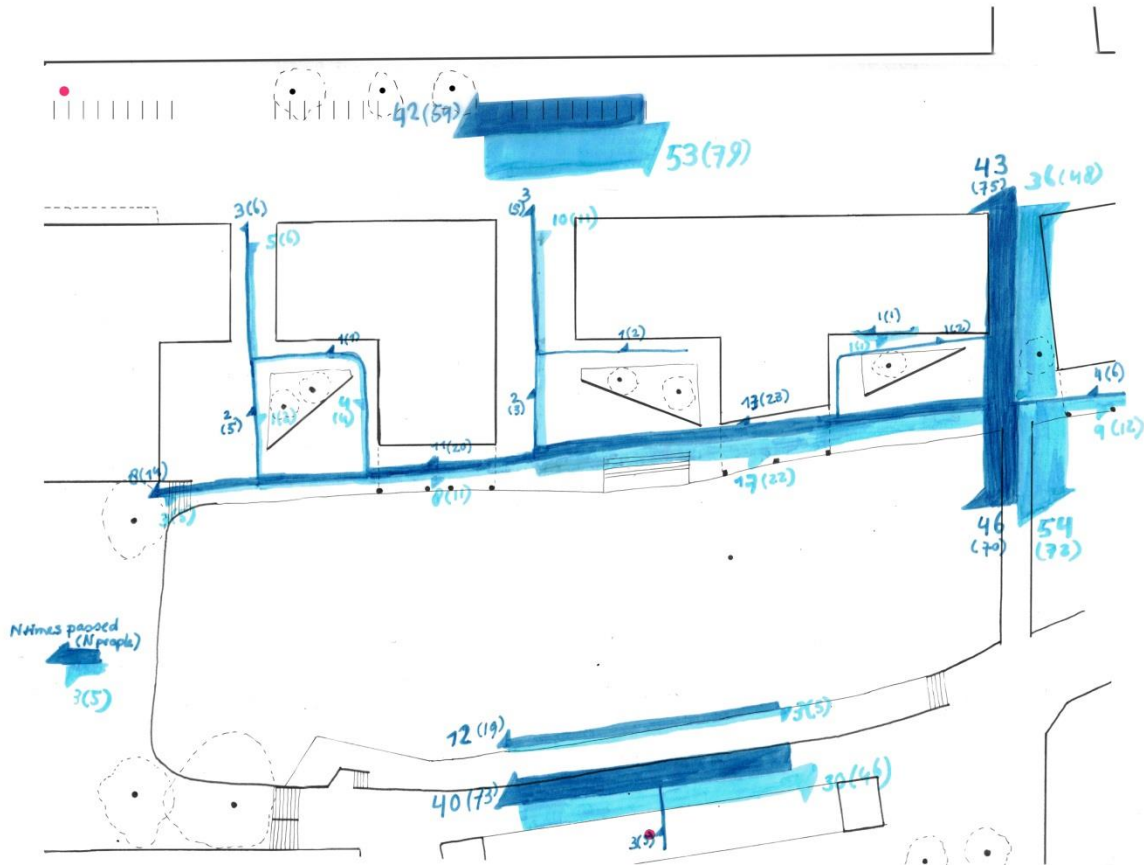


Figure 104 Observation of total routes taken by people by foot (own ill.).

From all the uses of the area for movement of fig. 71 we can note the importance of the bridge connection, the Westewagenstraat on top and the route before the podium where the observer was stationed. Much more than for cyclists the Westewagenhoven appear to be side tracks. These side tracks do have similar frequency patterns: the left street is used less often and the right side of the waterside attracts most of the pedestrian traffic in this area. An important difference however has to do with the versatility of transport by foot: pedestrians can go up the stairs towards the square left and they can go without much problem between the triangular green patches (although they do not often do that). A general conclusion from this map can be drawn about the composition of pedestrians: quite often they move around in groups.

Static activity

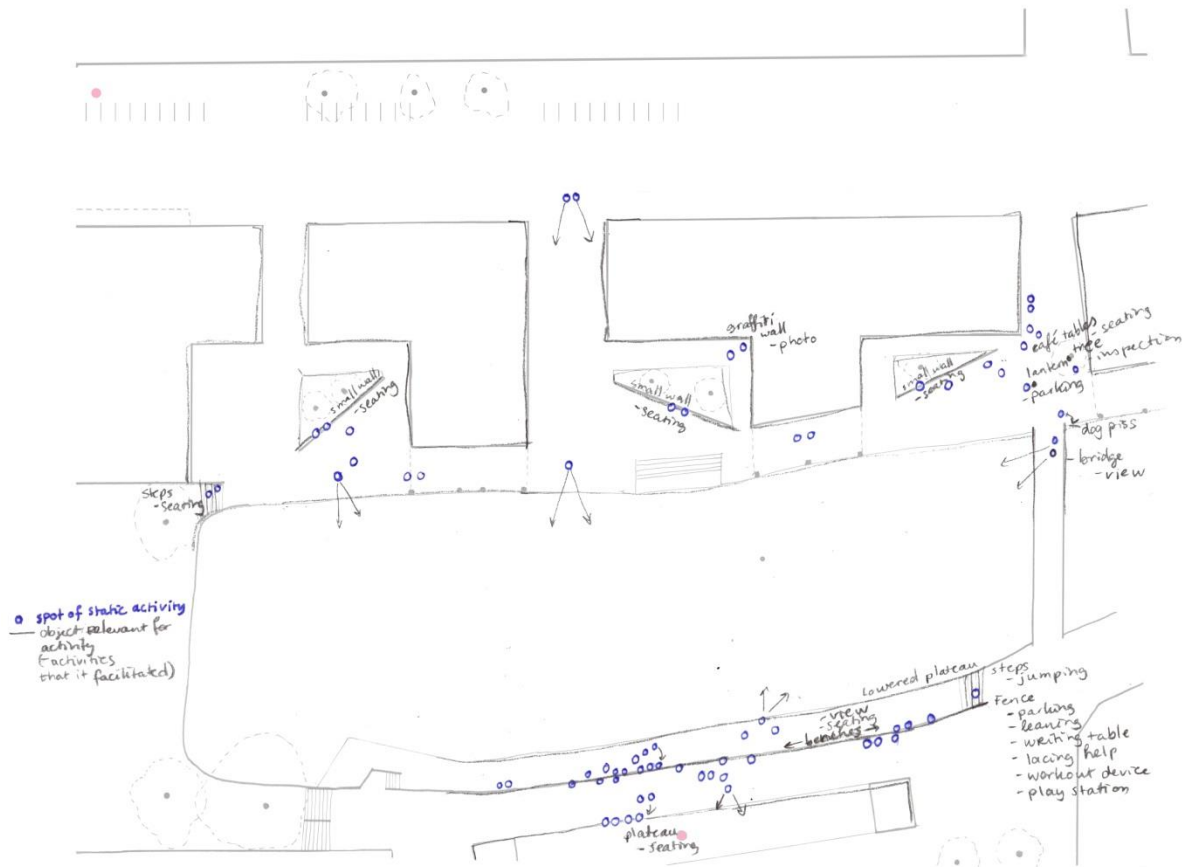


Figure 105 Cases of people by foot standing still (own ill.).

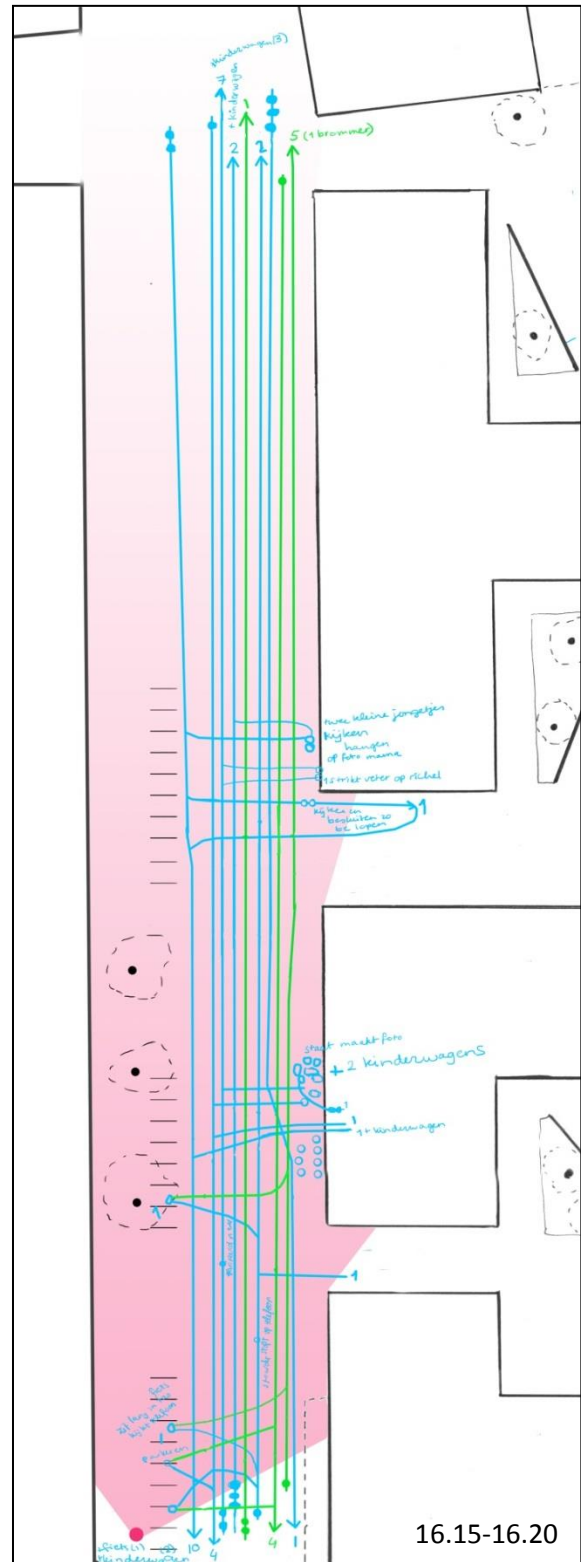
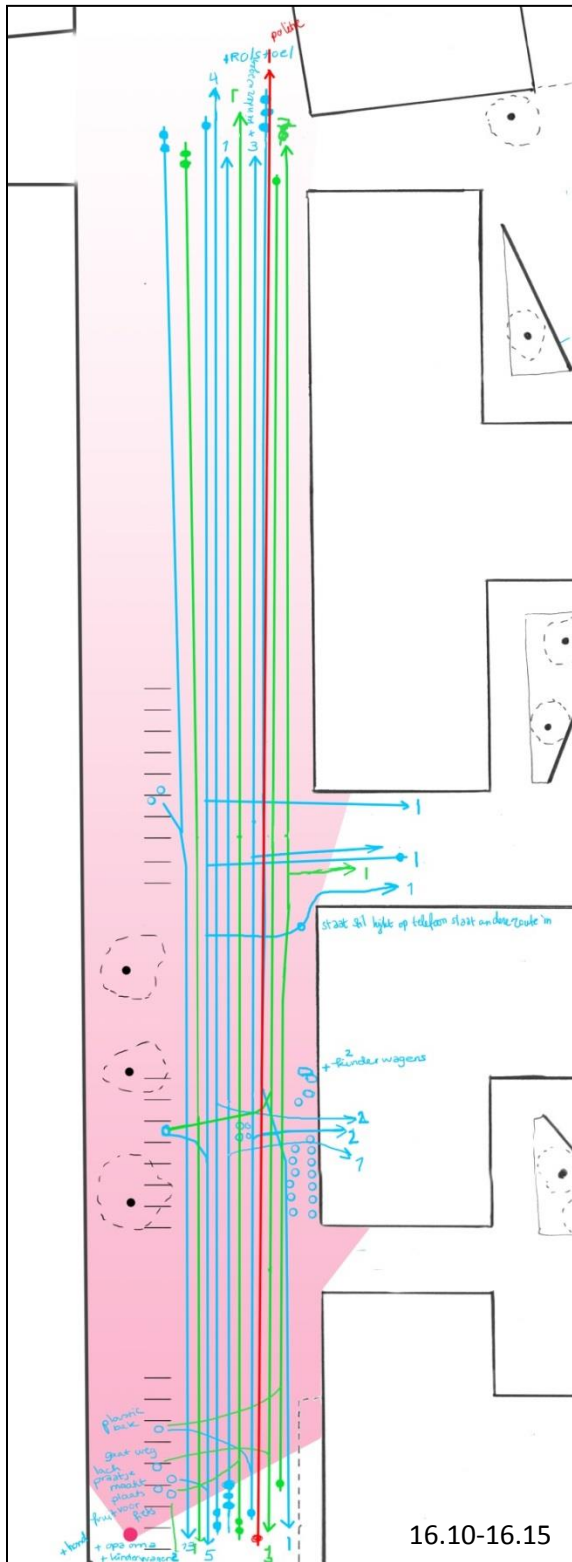
Concerning the places and activities pedestrians undertake when standing still, we can conclude from fig. 72 these are either dependent on the facilities and condition of the place (plateau, benches, stairs and small walls for sitting; opening areas for view and pictures; fences and lanterns for parking; fences and railings for leaning, writing, lacing shoes, working out and playing; graffiti as a photobackground) and secondary on the agenda of the pedestrian itself (waiting, calling, eating, wayfinding, visiting (and photographing), writing). A special category of interest was observed that I would call the moment of discovery of something: a sudden observation of something appealing makes the person stop to further investigate it and sometimes this involves moving further to understand the observed scene (examples with arrows in the Westewagenhoven). Another interesting activity was the act of watching: much of the benches to the side of the water being directed to the water, provided for a comfortable setting for parents of the boats users to observe their children but also for many others to enjoy the moving scenes of people and boats. When not provided with facilities to sit for instance on the upper Westewagenhoven waterside, the watching took on the form of noticing, sometimes stopping, looking around, sometimes photographing and again on the move.

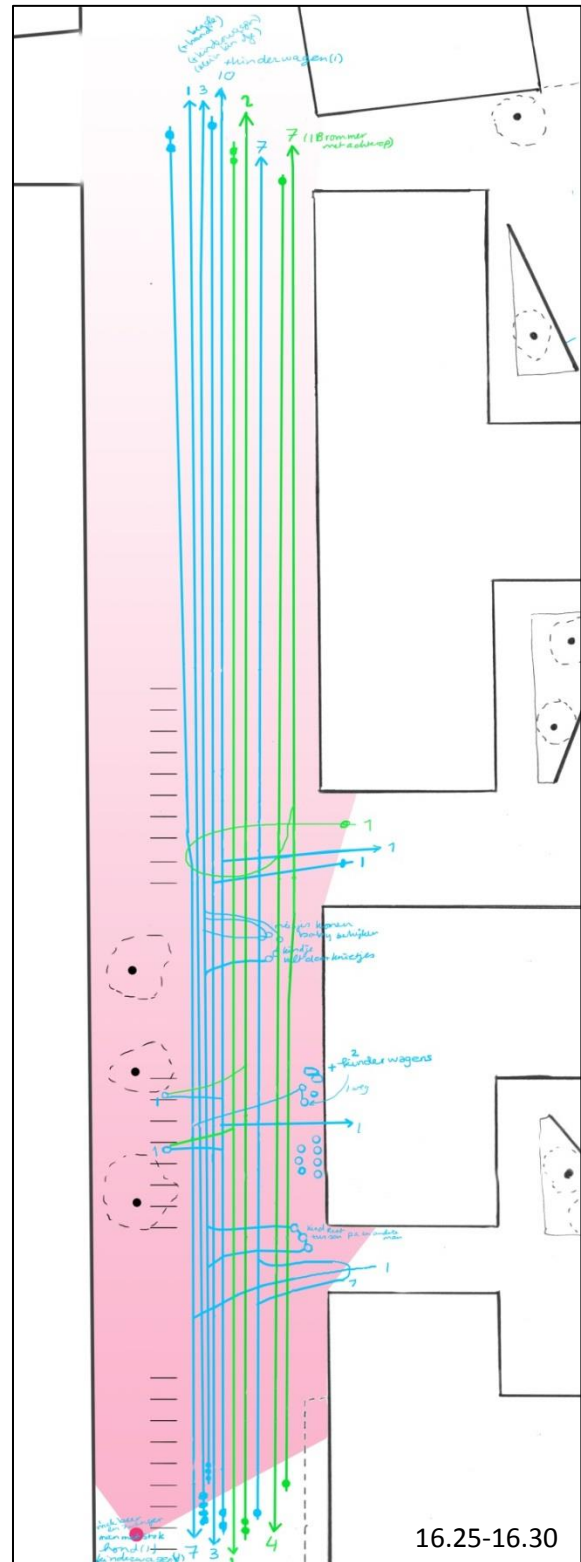
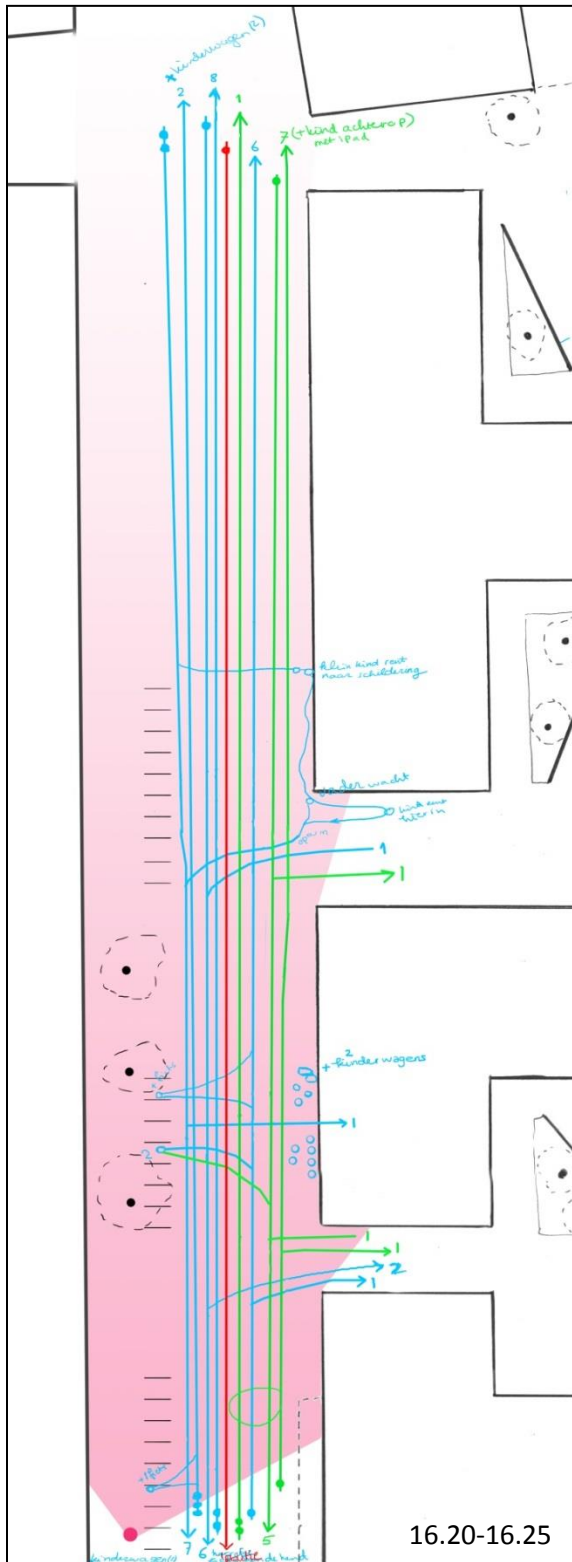
Routing – Detours

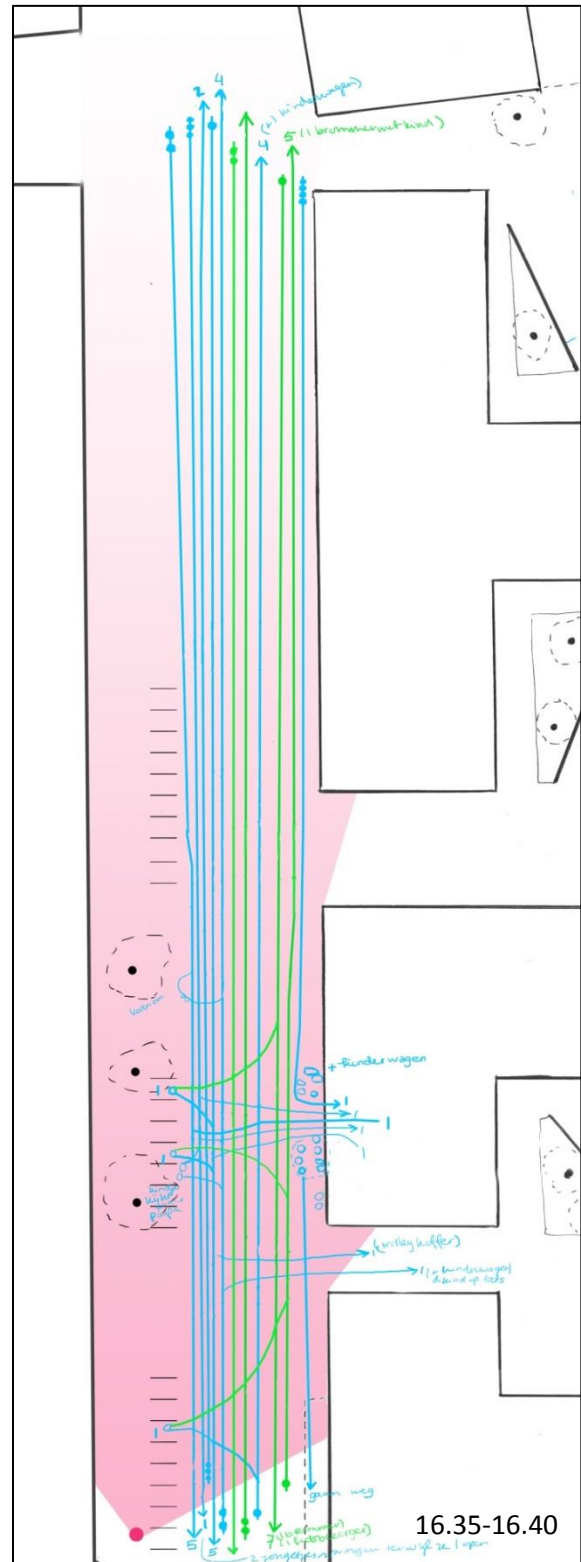
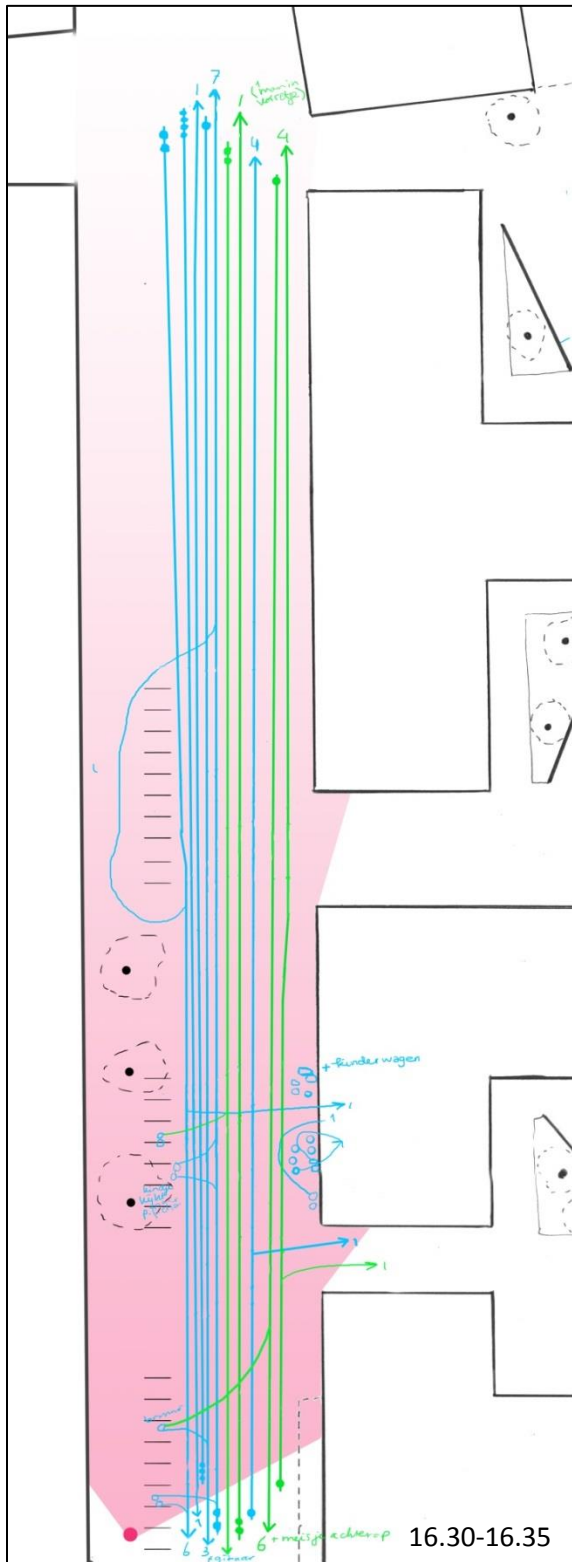


Figure 106 Peculiar non-functional routes taken by two-wheeled traffic and by foot (own ill.).

To discover the motives of the routes people take in this area more in detail, I've taken out all the cases of cyclists and pedestrians not taking the fastest or most direct path. This confirms the previous conclusion that some of the people take either a deliberate detour (for instance because this one is a more peaceful route) or get lured into an area where they did not intended to go (a track of discovery). Sometimes people on these tracks stopped, looked around and took photographs. Most of these last cases were driven by the viewing of something new or remarkable (possibly the church on the square) or they were tracing a specific object (following their grandson in order to make a photo of him in the boat).







Daily uses per vehicle, movement patterns



Figure 107 Still from the observation of Westewagenstraat (own ill.).

3.3.2.1 Two wheeled traffic

Movement frequency

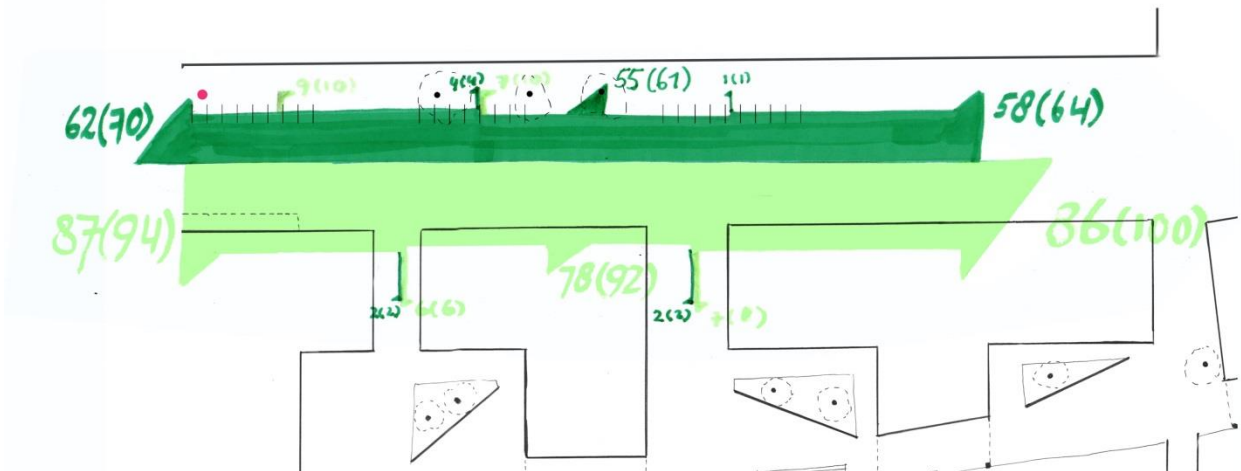


Figure 108 Total routes taken by thwo wheeled traffic (own ill.).

We can see in fig. 75 that there was quite a movement of people on two wheeled vehicles in the Westewagenstraat. Most of this seems to be passing the street and only few stop to park in the street or

take the routes by the water of the Westewagenhoven. Often cycling happens alone. In this street two wheelers did not stop (only to park their vehicle).

3.3.2.2 Foot

Movement frequency

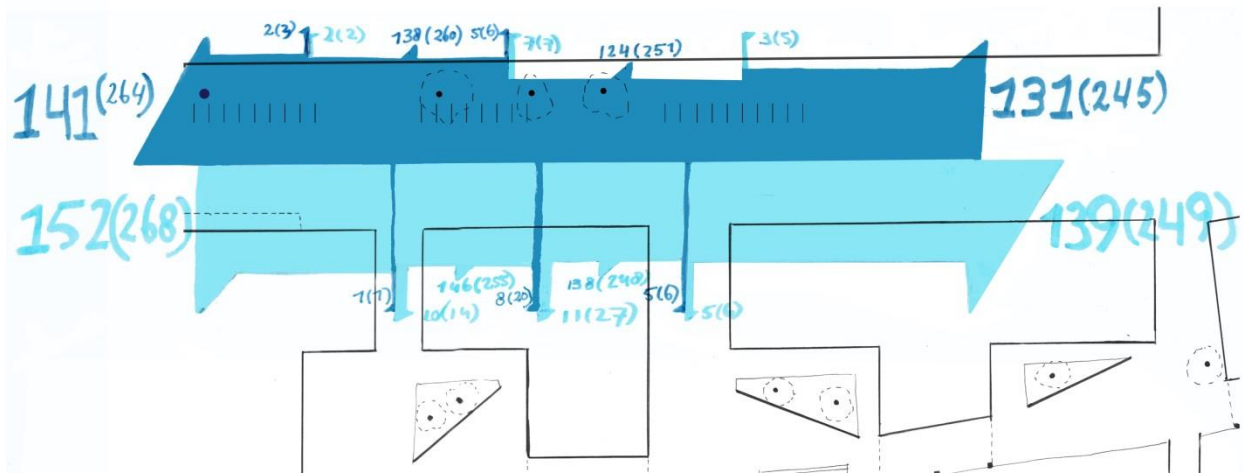


Figure 109 Total routes by foot (own ill.).

The numbers of pedestrians passing this street is even considerably more than the cyclists. Like the cyclists, the same pattern of the mainstream using the street for passage and only a few for parking and going of this route towards the water exists among the pedestrians. There is however an additional stream in this street happening towards the café and terrace of The TeaLab (arrows going inside the building at the bottom).

Static activity

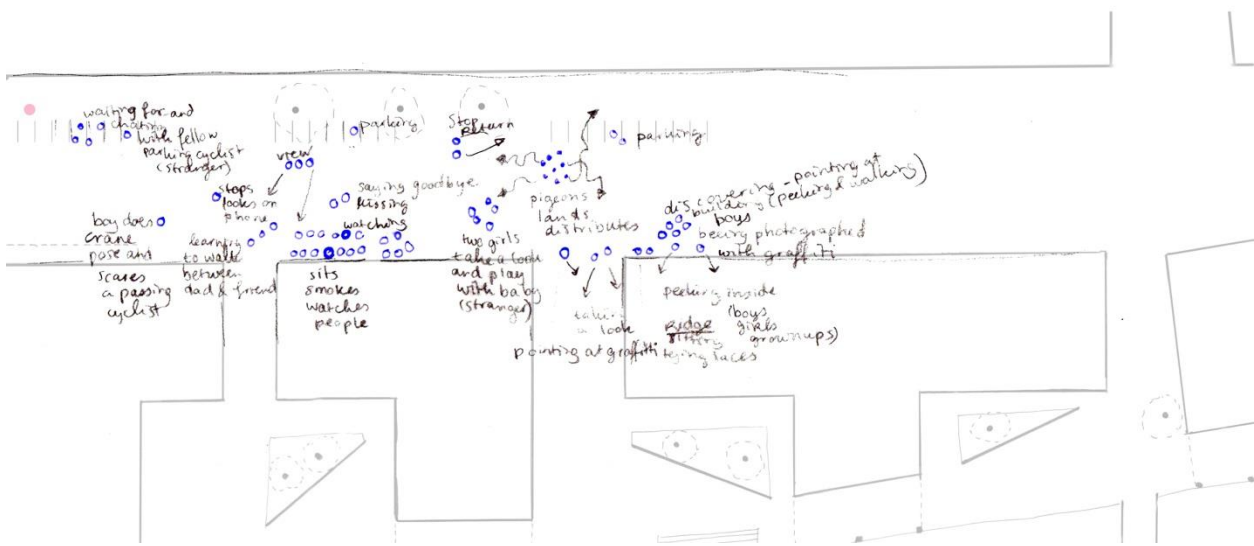


Figure 110 Points of static activity by pedestrians (own ill.).

Compared to all the static activities that happen in the areas of the Westewagenhoven and the bordering water areas, this street was not the scene of people sitting still much other than sitting in front of the café. A lot of things happened however while people were on the move: social encounters and interactions with strangers caused by common bicycle parking, by a baby and by play; discovering a route (intrigued by the partial view of the church) and object (what happens in a building which is partially visible, peeking inside the block to the right); playing while walking (mimicking a crane's movement, scaring passersby and learning how to walk between two people); distracted people (concentrated on phone only); decisions (mistakes, forgotten something or wrong route); waiting; saying goodbye; tying shoes; photographing (in front of graffiti); landing pigeons dispersing between people. For these activities, there are a few elements that the environment provides: places for parking bicycles and intriguing vistas and passages into the Westewagenhoven and a covered and painted (empty) building stimulate discovery. Possibly the character of this street being still not too crowded compared to the shopping street adjacent on the left, also stimulated stopping while moving if needed or wanted (boy playing crane and scaring passersby, suddenly stopping distracted by phone, saying goodbye to friends in the middle of the street). These elements of discovery, play and indecisiveness creates routes where people do not go straight to their intended goal. These detours are shown in the next section.

Routing – Detours

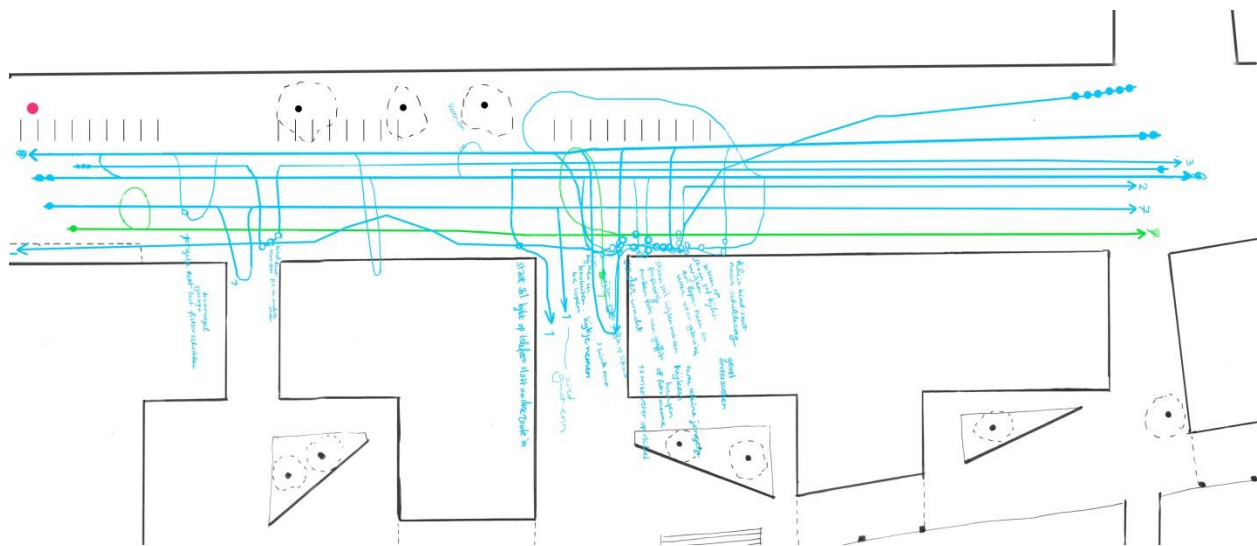


Figure 111 Peculiar non-functional routes taken by two wheeled traffic and pedestrians (own ill.).

As suggested in the previous section, the reasons for people to change their path were either triggered by themselves (decisiveness to turn around, play with others) or the environment (discovery of closed block and cafe). The closed of block covered with graffiti seemed to be of great appeal to many pedestrians. Secondary elements of the space with great interest were the vistas. Combining the spots where people stay in static position and the map of detours however show that these vistas do not always lead to people changing their route. It could be that human's curiosity to discover is balanced with the time they have available, their mental space for new inputs and the newness or already existing

knowledge of the observed. In the first two cases, the observer might still decide to take the deviated route of discovery another time.