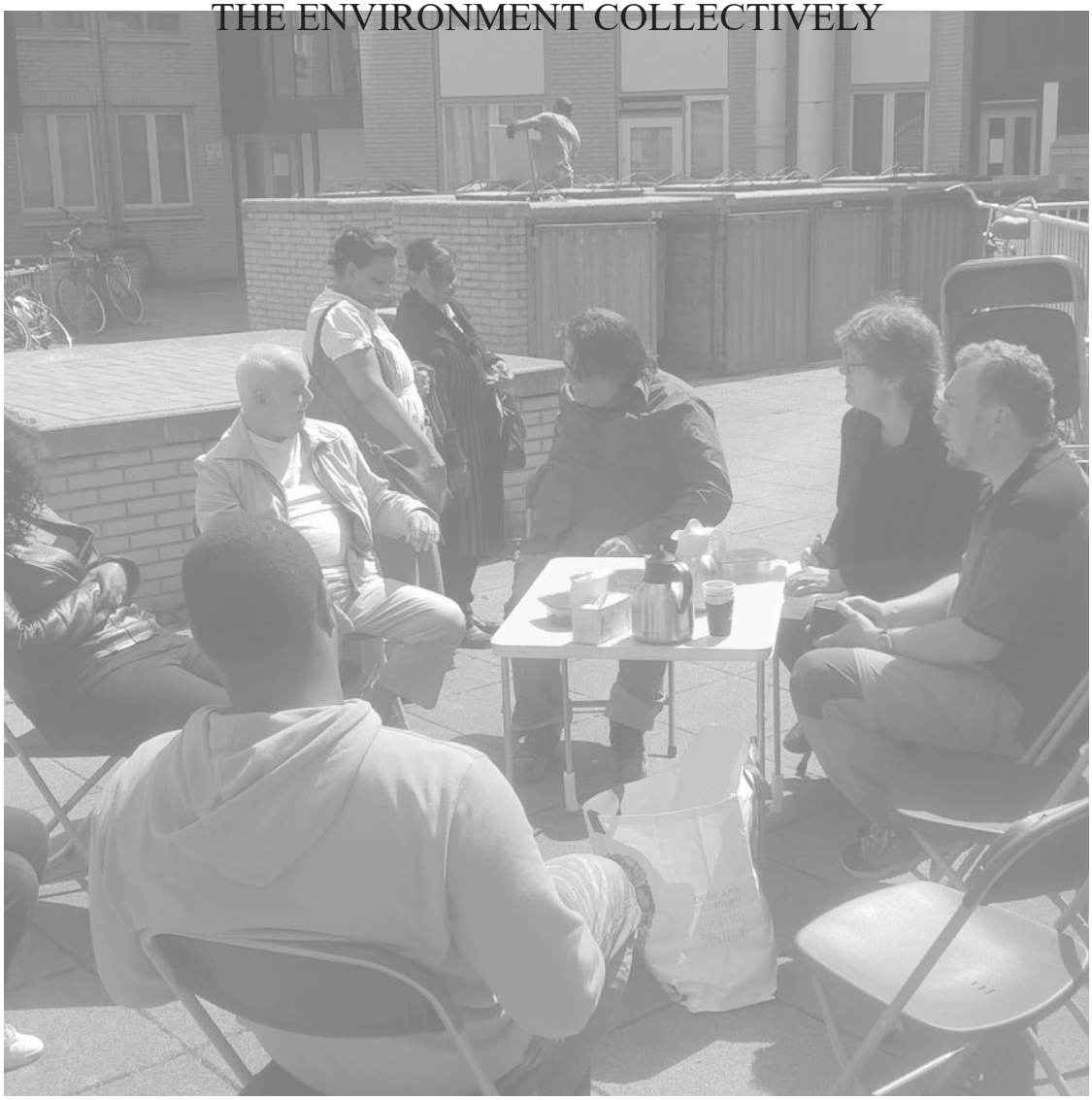
New Heritage Graduation Studio

NEW HUMAN NATURE

DEVELOPING HUMANITY AND THE ENVIRONMENT COLLECTIVELY



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AR3A010 - Research Plan

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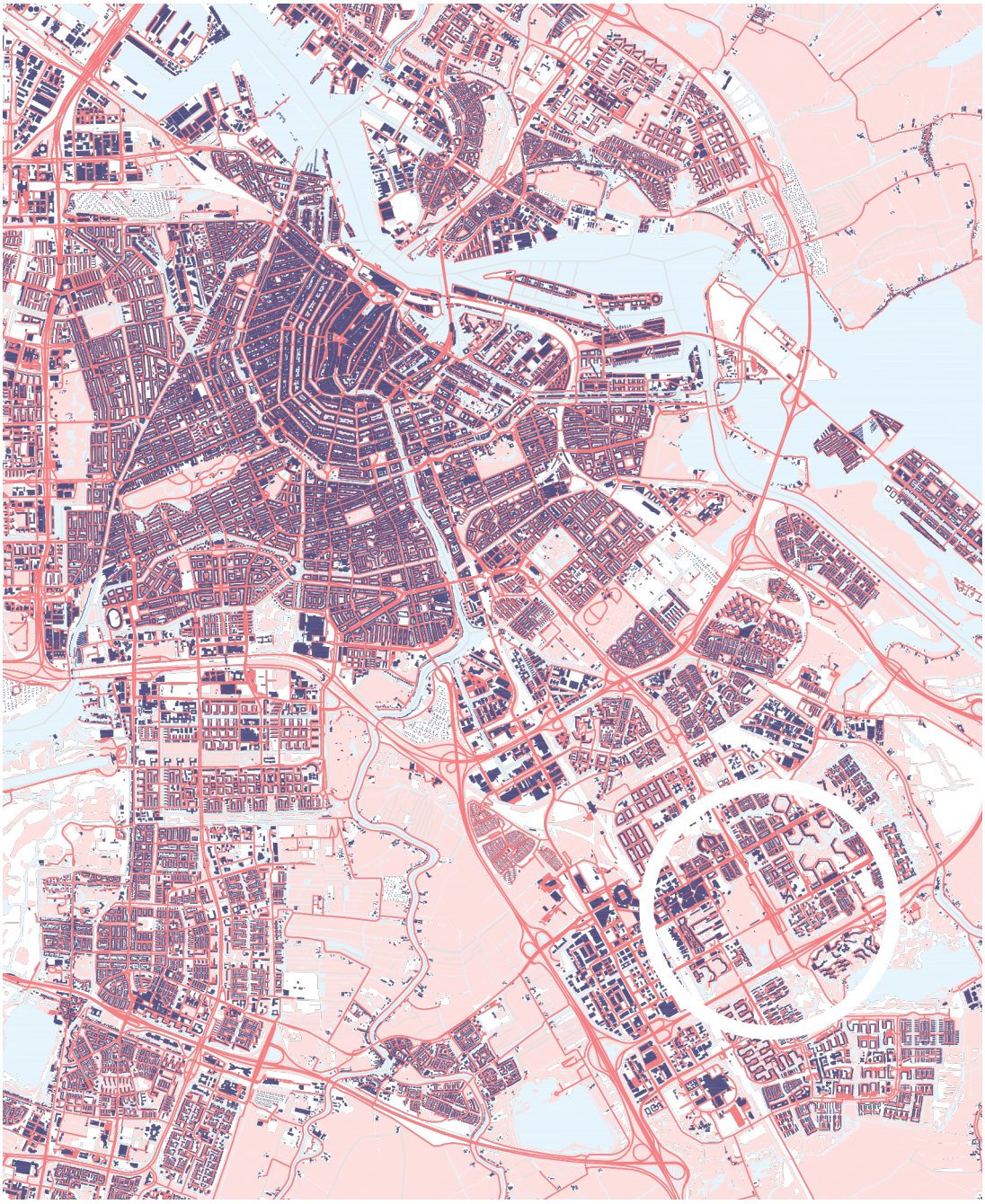


Image 1. Map of Amsterdam, Amsterdam Zuid-Oost is highlighted (1:2000) ↑N

INTRODUCTION

This project is called New Human Nature: Developing Humanity and the Environment collectively. The project takes international (anthropologic global warming) and national context (housing shortage) as main drivers. Intrinsic values (historic continuity) will be a guide throughout the graduation trajectory and extrinsic and use values will be informers to the design process. The goal is to densify an 80's neighbourhood through nature and dwellings. Both will be explored simultaneously and design decisions will be informed by in- and extrinsic values found in the area.

The project is located in the H-buurt in Amsterdam Zuid-Oost (image 1). The whole area is a new extension of Amsterdam due to the housing shortage after the Second World War (van Osch, n.d.). The H-buurt consist of three different neighbourhoods, all with social housing owned by the housing corporation Ymere. These areas are Bijlmerplein, Hoptille, and Heesterveld (image 2). My project will be focussing on the neighbourhood Hoptille (image 3a-c). Hoptille is in the middle of the three project locations and is made of mid- and low-rise buildings. Hoptille was built in 1980 as a reaction against the high-rise buildings in other parts of the Bijlmermeer. The neighbourhood also includes two large parking garages and several office buildings. All dwellings are all social housing. It was commissioned by the Gemeentelijke Dienst Volkshuisvesting (Municipal Housing Service) of Amsterdam and designed by Pi de Bruijn (Bijlmermuseum, 2017).

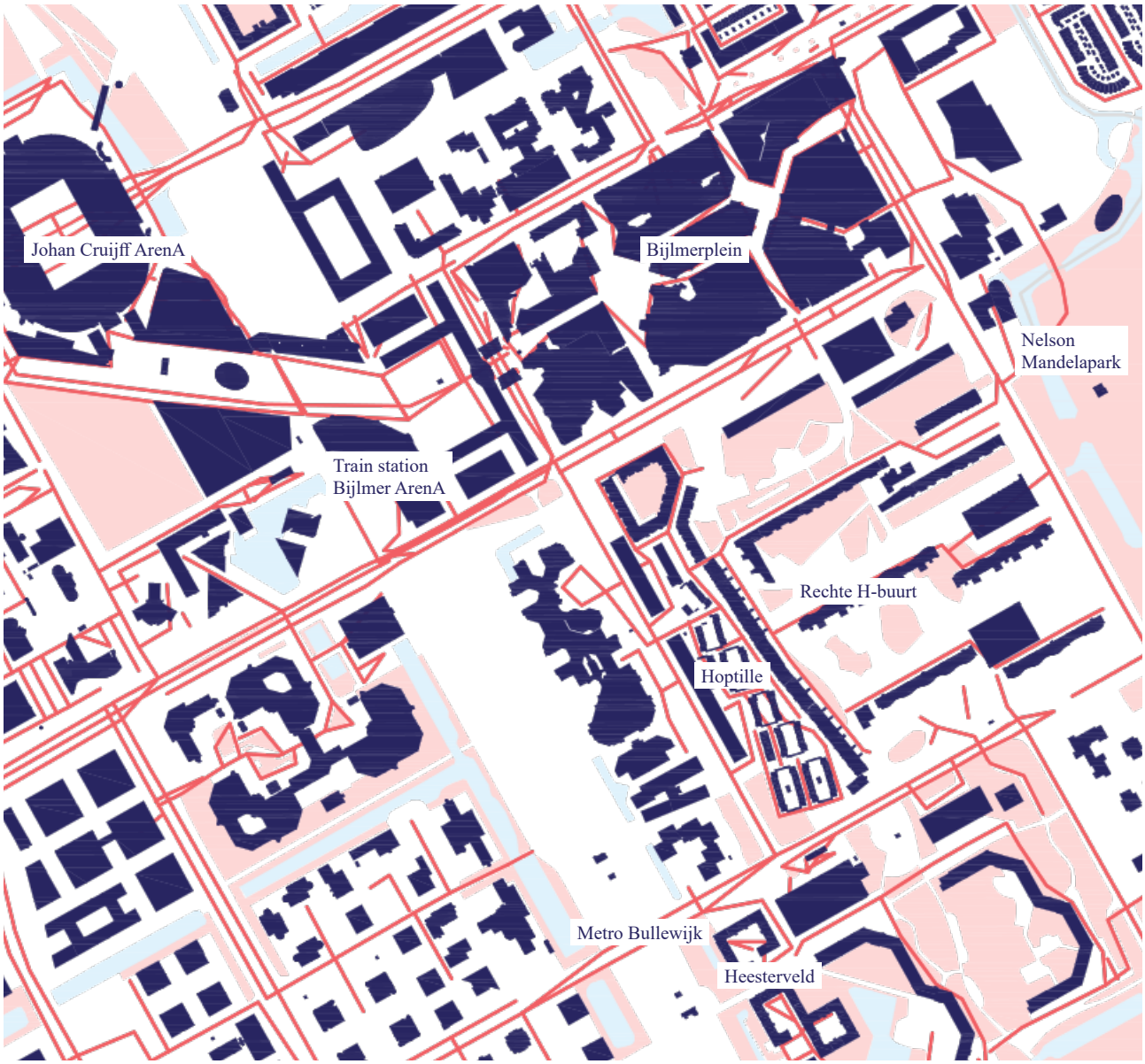


Image 2. H-buurt and surroundings (1:200)

Image 3a. Hoptille, Randal Scobie (1982)

Image 3b. Hoptille, current backside

Image 3c. Hoptille, current frontside

PROBLEM STATEMENT

Anthropologic global warming started over 7,000 years ago. Through agricultural practices humans have changed the order of the ice ages and started the modern climate era (The Climate Centre, 2020). However, the industrialisation of the 19th century has accelerated these changes in the climate. Data shows an increase in CO_2 emissions in the air from the begin 1800s. This results in a global increase of temperature. Even with current pledges and targets, the temperature will increase 2.5 to 2.8 degrees Celsius globally by 2100. Right now, this is 2.8 - 3.2 degrees due to current policies (Ritchie & Roser, 2017). The issue is getting more and more urgent.

The energy used in buildings is good for 17,5% of the total greenhouse gas emissions worldwide. Cement itself is good for another 3% of the global total (Ritchie & Roser, 2020). There are many opportunities to improve for this sector.

It is a complex problem with many aspects. Therefore, the focus of this graduation project will be based on the model shown in image 4. This diagram is based on the Sustainable Development Goals (SDG's) made by the United Nations in 2015 (United Nations, 2020). The Stockholm Resilience Centre (Stockholm University) developed this diagram in order to reflect on and create relations between the goals. The diagram shows that the societal and economic goals are embedded in the biosphere and takes the latter as a priority. The biosphere is made up of 'Life on Land', 'Life below Water', 'Clean Water and Sanitation', and 'Climate Action' (Stockholm Resilience Centre, 2016). Within my graduation project, I will do the same.

Image 4. Structure of the seventeen development goals (Azote Images for Stockholm Resilience Centre, Stockholm University, 2016)

In addition to reversing global warming, the Netherlands is faced with extra challenges, similar ones as after the Second World War; housing shortage (Lans et al., 2016). There is a mismatch in housing across the country. As of 2020, there is a shortage of 331.000 home. The government has estimated that 845.000 homes need to be built between 2020 and 2030 in order to keep up with demands and resolve this shortage (Ministerie van Binnenlandse Zaken en Koninkrijksrelaties, 2020). These are huge numbers for a small, and already dense, country as the Netherlands. The current housing stock in 2020 is 7.891.785 (Rijksoverheid, 2020). This means 10,7% of the current housing stock needs to be added. The question now is how to densify the Netherlands?

RELEVANCE

Wider context

There are several reasons why this densification challenge can be researched in the Hoptille. First of all, the Hoptille was built out of necessity between the 60's and the 80's. After the Second World War, there was a huge housing shortage in the Netherlands. This was tried to resolve by building over one million new homes (Lans et al., 2016). This happened through new towns, like Almere and Lelystad, and expansion areas of larges cities, such as Amsterdam Zuid-Oost, including the H-buurt. The question posed earlier actually is: How to densify the Netherlands again? By looking at these former expansion areas, we can learn how to approach this topic nowadays.

The second motivation is related to the SDG's mentioned earlier. The mind set towards the existing built environment has changed. Before, buildings could easily get demolished if they were not suitable anymore, and did not have a heritage status. Now, people realise that a building contains embodied energy which should not be wasted. Embodied Energy is the total energy needed to construct a building, from the mining of materials to the transportation. Its construction had an impact on the environment. By demolishing and building new, more stress is put onto the planet, even if the new building is more energy efficient (National Trust for Historic Preservation, 2011). Since 2012, more and more non-listed buildings, mostly office buildings, were transformed due to this change in mindset (Centraal Bureau voor de Statistiek [CBS], 2019).

This means a new way of thinking within the Heritage and Architecture field. Embodied Energy becomes a value present in all buildings (image 5). It should then be further explored if and what additional values exist for each project. This approach of 100% Heritage encourages to explore and see value in the entire built environment. It explores the heritage of the common and ordinary, rather than just the unique. It thereby questions the traditional objectives of what heritage is. For this project, I am going to explore not just densification, but to use the existing fabric and structures, tangible and intangible, to its full potential while adding dwellings.

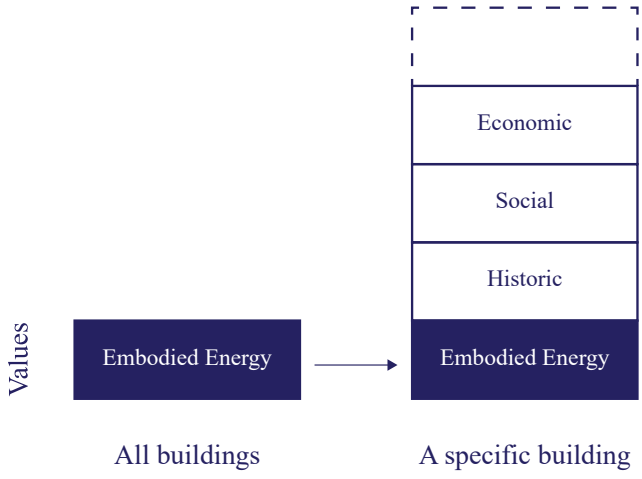


Image 5. 100% Heritage Scheme

Contribution to knowledge

The research focusses on a part of the housing stock that is fairly unexplored from a Heritage perspective. As of 2020, 44,9% of the current housing stock is built between 1960 and 1989 (Rijksoverheid, 2020). These buildings tend to have a lower energy label and are in need of improvements (Ministerie van Binnenlandse Zaken en Koninkrijksrelaties, 2019, p.82). This is almost half of the total housing stock and thus a great challenge for architects in the years to come. With the clear presence of the consequences of global warming, I will look into the revitalisation of these 80's neighbourhoods, taking Hoptille as a case study. Hoptille does not represent the typical 80's neighbourhood. It is more complex, which means resolving issues in Hoptille should be do able in other neighbourhoods, too.

Image 6. Kempering garage (Stadsarchief Amsterdam, 1979)

FRAME OF REFERENCE

In addition to global and national context, other personal fascination within architecture have been from an anthropological and phenomenological point of view. During my theory thesis, I started to explore the appreciation for non-listed new heritage and where this appreciation could originate from. Therefore, I studied the connection humans built with their environment through experience and memory by taking a modern heritage case study as a starting point, the Bijlmermeer parking garages. My thesis explains that the connection can be established with any architectural element/building/urban element, not necessarily a listed building or aspect, by combining multiple theories including Massumi (1998), Mallgrave (2019), and Schrijver (2020).

I would like to explain this further through Brian Massumi's text 'Sensing the virtual, building the sensible' (1998) and the chapter from Lara Schrijver 'Ugliness as aesthetic friction: Renewing architecture against the grain' in 'Architecture and Ugliness. Anti-Aesthetics and the Ugly in Postmodern Architecture' (2020). The other texts are incorporated in the annotated bibliography under Frame of Reference.

Massumi (1998) states that a building has two lives and in between those two is a threshold. The first life is the design process of a building, the virtual life. The construction of a building marks the threshold, after which the second life begins, the actual existence of the building. The completed built form should not be considered the end result, a static, but rather the start of a new process. Within this theory, a building is viewed as a living object exposed to daily life. According to Massumi, daily life consists of two acts related to the building, looking and dwelling. Looking is the exterior experience of the built environment, while dwelling is the interior occupation and use of a building. A building is looked at by the many, though a minority gets to dwell in a building. Both looking and dwelling are continues process throughout the life of a building.

In line with this thinking, Lara Schrijver (2020) describes the difference between architecture and art. A building, in contradiction to, for example, a painting or a sculpture, is meant to be used. Architecture has functional qualities to fulfil and with this sets itself apart. Both theories extend the building from the realm of the architect into society.

I would like to illustrate these theories with the topic of my thesis, the parking garages (image 6) in the Bijlmer. These were valued by the residents in the neighbourhood through activities, memories, and represent a vision on new ways of living of the last century. The garages itself do not possess any specific or special architectural features for them to become this valued. However, the combination of human experience and memory with its historical context elevated the appreciation of the parking garages. To me, this shows that the built environment is for and from everyone.

The theories above imply an evolving and living built environment, meaning the values attached to it are as well. Heritage values have shifted from being 'found' by experts and intrinsic to the object itself to being produced by its context and interactions. This means values are contingent and extrinsic, too. Extrinsic values can only be understood when looking at the social, historic, and spatial context. This does not mean intrinsic values will never be present. Extrinsic values enlarge the definition of a value within architecture in order to fully understand the built environment (Mason, 2002).

Annotated bibliography

The annotated bibliography will support and provide context to the statements above. I have chosen four sources to highlight my though processes in addition to the bibliography of the entire research plan.

Mallgrave, H. F. (2019). *From object to experience: The new culture of architectural design* (2nd ed.). Bloomsbury Visual Arts.

Harry Francis Mallgrave is an architect, scholar, and Distinguished Professor Emeritus of Architecture at the Illinois Institute of Technology in the United States. In his book 'From Object to Experience', he describes the role the senses play in the experiencing of architecture. Five out of six senses are important according to Mallgrave, not just vision. Sound, smell, touch, and proprioception are important as well. All work together in order to register the environment. Mallgrave states that this better understanding of the senses will help architects become better designers. It will focus the attention of architects on emotional responses and the influence of the built environment on the well-being of humans. This helps the project to relate to the human perspective during the sustainable development and enhance living experiences for the inhabitants.

Lefebvre, H. (1997). The Everyday and Everydayness. In S. Harris & D. Berke (Eds.), *Architecture of the everyday* (pp. 32–37). Princeton Architectural Press.

Henri Lefebvre was an established sociologist during the previous century. Lefebvre reflects on the everyday in his text, originally written in 1972. The everyday is a concept and a product. The everyday consists of systems, but is not one itself. It is the common denominator. The everyday is both cyclical and linear. The everyday implies changes such as day and night, seasons, life and death. Its linearity is embedded in the repetitiveness of work and consumption. The everyday is the most universal and the most unique, social and individual, the most obvious and the most hidden. The everyday is the overarching aspect of life. The study of the concept of everydayness should reveal the extraordinary in the ordinary, for as the surprising and magical is also part of the real. His text is still relevant, since the everyday still overarches life. The project also explores an ordinary neighbourhood and sets the ordinary as a value.

Kuma, K. (2011). Natural Architecture. In S. Lee (Ed.), *Aesthetics of sustainable architecture* (pp. 179–185). essay, 010 Publishers.

Keno Kuma is a world-renowned Japanese architect with projects all over the world. In this text, Kuma reflects on cultural differences between the West and his homeland. The reason for this is the current environmental issues present globally. How do the two cultures view topics as comfort and sustainable materials? Kuma mentions his goals to alter ongoing prejudices about natural and sustainable architecture on the basis of three different projects. To him, the world has become too standardized, in act and thought. A part of the problem is the engineering calculations and how we deal with the data. Kuma states, however, that the quest for 100% natural architecture is an unnecessary struggle. We have to accept that the result we will never be perfect. Kuma concludes by pleading for experimentation and creating a balance in the way we produce and use. The text provides a critical view on what is sustainable and what is sustainable architecture. This is useful for the project since it focusses on sustainable development. Kuma's described projects are not directly applicable to the project, but his way of thinking is. It questions typical Western methods to see what else is possible.

Petzet, M. (2012). Introduction: Architecture as a Resource. In M. Petzet & F. Heilmeyer (Eds.), *Reduce Reuse Recycle: Rethink Architecture - German Pavilion 2012* (pp. 9–11). Hatje Cantz Pub.

Muck Petzet is a German practicing architect. This text by Petzet is the introduction to the German Pavillion for the thirteenth International Architectural Biennale in Venice in 2012. The pavilion has the topic 'Reduce, Reuse, Recycle' and consist of sixteen projects with different strategies and approaches. If one only looks at energy consumption, the best way to improve a building would be through minimal intervention. Because energy consumption is not the only factor in architecture, a hierarchy is made: First reduce, then reuse, and lastly recycle. Petzet describes the reason for the theme; a surplus of architecture in Germany and a shift in focus to transform the old, rather than building new. The study for the biennale focusses on the ordinary within architecture. The entire project calls for one thing: Valuing what already exists. This thinking is in line with the notion of 100% heritage. It shows different approaches on how to deal with the existing built environment.

RESEARCH QUESTIONS

This finally brings me to my research questions. The formulation of the questions is based on the lecture given by Stavros Kousoulas on the 1st of October, 2020. During this lecture, he stated that question for research in Architecture should not begin with ‘what’. To Kousoulas, this triggers a discussion that can only result in conflicting opinions and not in answers. By beginning the research questions with differently, such as ‘how’, ‘when’, or ‘with whom’, a more effective discussion can arise. v

Site

The two topics, global warming and housing shortage, cumulate in one specific location, Hoptille. During the first research phase (see Method, 1. Extrinsic Values), it was discovered that the neighbourhood was a reaction to the expansion areas of the Bijlmermeer. By studying the reaction to earlier solutions to housing shortages, one can discover how to deal with this issue nowadays. More information acquired during the research revealed that the technical states of the buildings are quite bad. Due to the economic crisis of the 80’s, buildings were constructed cheaply, resulting in technical issues today. These should be addressed to increase comfort and decrease energy usage. These aspects to Hoptille are shown in image 7.

Lastly, the research brought up many negative opinions and aspects about Hoptille, from various perspectives. This triggered interest in me to explore the neighbourhood further so I might uncover positive qualities.

Questions

My main question therefore is: How can the neighbourhood Hoptille be densified in terms of housing and nature while enhancing and preserving in- and extrinsic values (if present)?

In addition to this, there are several sub questions to support and structure the main one. These questions are:

How can the resource efficiency be maximised in the neighbourhood?

How can the biodiversity be maximized in the neighbourhood?

How can the social benefit be maximized in the neighbourhood?

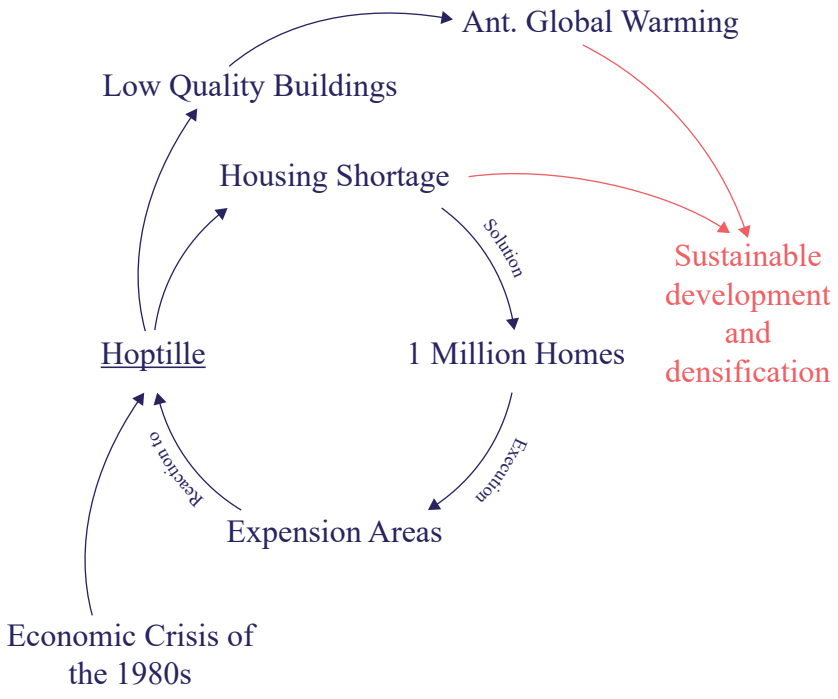
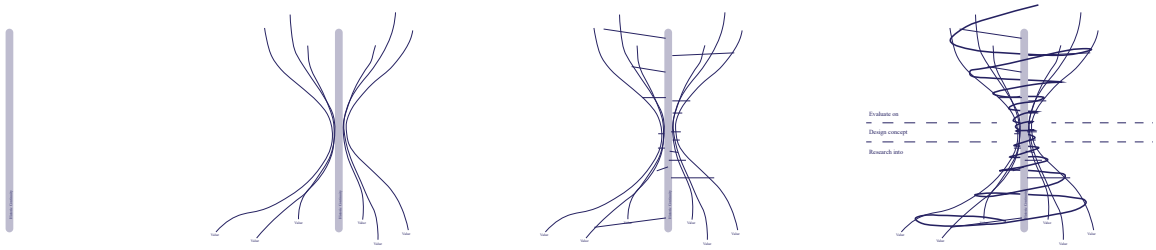


Image 7. Why Hoptille?



1. Historic Continuity 2. Value Lines 3. Click-on Lines 4. Design process

Image 8. Steps to Structure of Thought Model of Job Roos (2007)

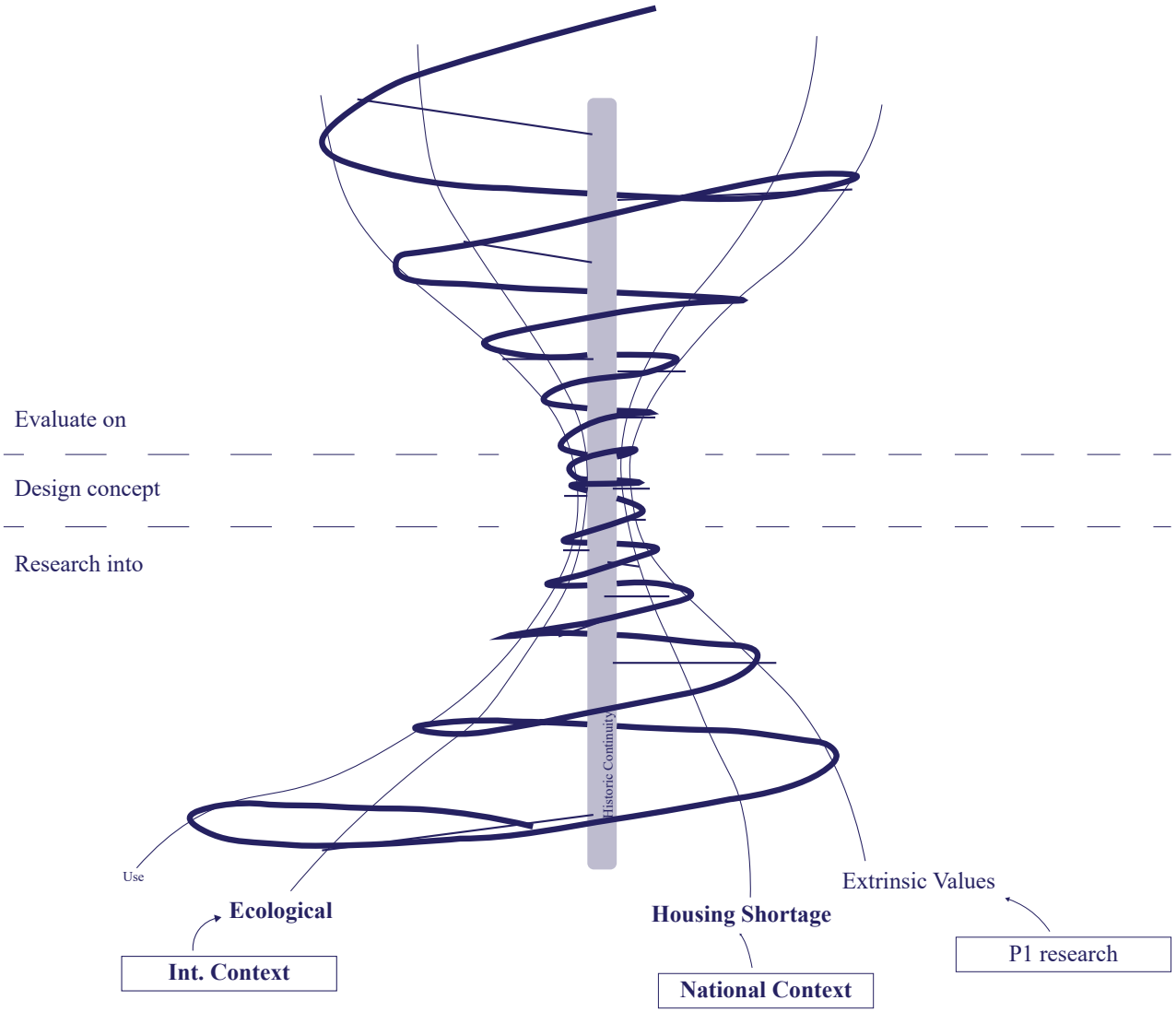


Image 9. Design Scheme (based on Job Roos, 2007)

METHODS

In order to answer the main question, I will base my research on a thought model of Job Roos in ‘Discovering the assignment’ (2007). In his book, Roos explains an approach to dealing with the built environment based on values. He calls is ‘the Spiral’.

The Spiral is set up of four elements, the historic continuity, value lines, click-on lines, and the design process (image 8). Historic continuity (1) is the first step of the thought model and ensures the respect of cultural historic values. Around this, there are six value lines (2). Each value line represents a specific aspect that challenges the historic continuity. In Roos’ model the lines are the plan of requirement, future use of the building, economic value, the aesthetic value, the social function, and the ecology. The click-on lines (3) connect the values to the historic continuity and act as checks. Around all these elements, there is the design process (4). It circles and touches every theme, making the process iterative. As shown in image 8, the bottom half of the model starts out large and general and narrows towards the middle. During this phase, research on all different values is conducted leading to the design concept. After the development of the concept, the thought model widens again and the design is tested against the values surrounding it (Roos, 2007).

For my process, I will adapt this thought model to structure my methods (image 9). Just as Roos, I will take the historic continuity as a base. I will relate to history through a timeline, rather than preserving one specific moment in time. Since I state that values are extrinsic and contingent, they are subjected to change over time. Therefore, I will work with time layering. The historic continuity will also reveal intrinsic values. Furthermore, there will be four value lines instead of six. These will be based on the three themes, extrinsic values, SDG’s, and densification, and one additional value, the use value. Use value is added due to the relation of the project to social housing. The practicality of this dwelling type should be taken into consideration throughout the process. The smaller number in value lines is explainable through the extrinsic value line. This value line will encompass multiple values.

The structure is used to combine all the themes simultaneous and will lead to a concept on the urban level (1:500) for the P2 presentation. After the presentation, one or two elements of the concept will be worked out to a detail level (1:5).

I will elaborate on my three main themes in the next subheadings. The first one will cover the extrinsic values. These were explored through collective research leading up to the P1 presentations. The second part will clarify the research related to the biosphere of the SDG’s. This research will be conducted individually. Lastly, the methods related to densification are explored. This will start collectively and then be further developed individually.

1. Extrinsic values

An important factor in the setup of the research method for this studio is the Faro Convention of 2005. The convention highlights the relation of heritage to communities and society. It states that objects and places are important because the people have given it meaning, values, and uses, not the objects and places in and of themselves. The convention encourages the involvement of citizens and communities in defining values and cultural heritage (Council-of-Europe, 2005). All stakeholders are important in defining what is essential and significant. The Faro convention is in line with the thought that values are extrinsic. It broadens the perception of heritage.

From this perspective, the method to interview different stakeholders was selected as a main source for this research. The stakeholders are based on the heritage markets by Howard (2003); Insiders, Outsiders, Owners, Academics, Makers, and Government (image 10). These were chosen so all the perspectives on the studio topic were covered. The research will focus on finding possible extrinsic values in the H-buurt.

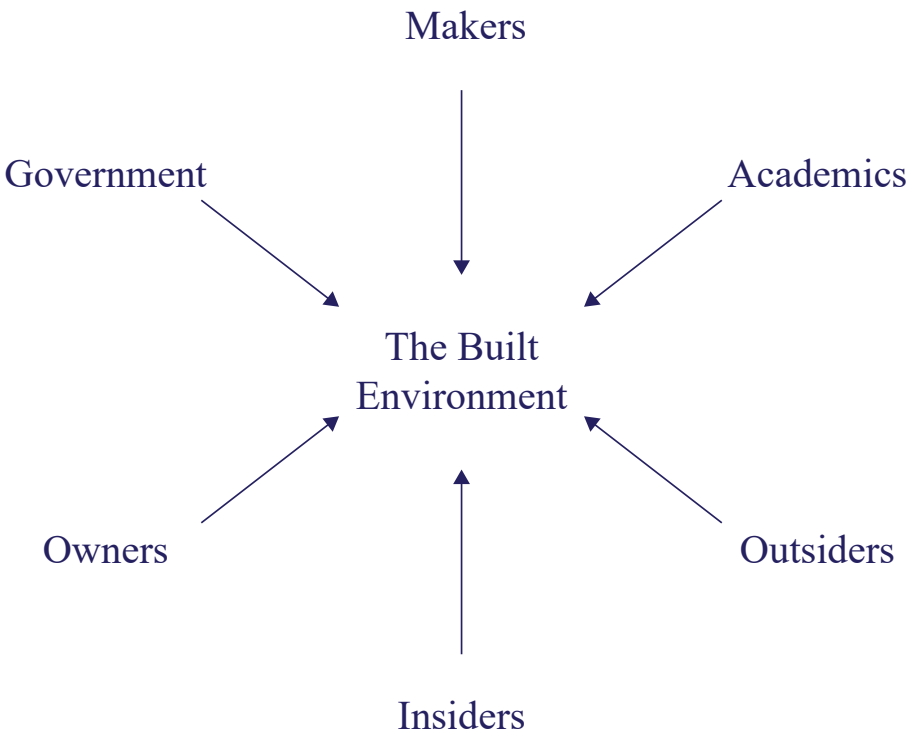


Image 10. Stakeholder Scheme

Almere-Haven

The pilot research in Almere Haven is used as an experiment, before diving into the research in the H-buurt. During this experiment, the goal is to establish a frame of reference and to test research methods in order to extract the attributes and values from the opinions of in- and outsiders over the course of two weeks. The pilot research consists of two approaches, a media one and an on-site one. Both methods explore residents' experiences, memories, opinions and

perceptions, as well as opinions of outsiders on social media. Due to the short timeframe, the focus of the pilot research was on Insiders and Outsiders. The research in H-buurt was more elaborate and attempted to cover all perspectives.

After this pilot research, the methods were discussed and the best methods were applied in the H-buurt research. These were social media research through Instagram, Facebook, and Flickr and photo-based interviews and questionnaires for street interviews.

H-buurt

To start the H-buurt research, the whole group divided into four smaller groups. Each was appointed a heritage market according Howard (2003) in order to cover the different perspectives in the area. The division was as followed: Insiders/ Outsiders, Owners, Academics/Makers, and Government.

A collective strategy and method were developed to create comparable results across all groups. The strategy followed a weekly schedule with the same focus for each group. Within this, different methods were used by the groups to achieve this focus. The first week was for exploration and in the second week a similar method was used by all groups, photo elicitation. With the method photo elicitation, photographs are used to trigger reactions within the interviewee. Images tend to evoke deeper emotions. This can be photographs, paintings or other visual media (Harper, 2002). For this research, five photos were taken in the three neighbourhoods and shown to all interviewees along with a collective question. For most groups, the photo elicitation was part of an in-depth interview. These were set up according to Hennink, Hutter, & Bailey (2020a). The interviews started with an ice-breaker to gain the trust of the interviewee, followed by the photo elicitation. The interview ended with closing question so it did not abruptly end.

Some of the interviewees participated in a physical narrative walk. While walking through the area, earlier mentioned values were confirmed and further specified. During the walk, photos will be taken of important elements to the interviewee and give more insight into their perspective (Gabrielle, 2005). The media research, from the pilot in Almere, was used for the users only.

These answers were then compared in week three. The fourth week was used to gather more in-depth information and/ or the processing of the data. The method for processing of the data was equal for all groups. The program Atlas.it was used to code the data to be analysed later on. For coding, an inductive strategy is chosen. This approach requires reading the data and identifying codes throughout the process. It is not clear which codes will be included in the final code book beforehand. This ensures that the codes reflect the issues of importance from the interviewees, not the preconceived notions of the researchers (Hennink, Hutter, & Bailey, 2020b).

After gathering all this information, conclusions can be made. The group came together several times throughout the four weeks of research to deliberate on this. The results were compared through various methods.

The first is the value matrix. This is a well know tool in the heritage and architecture field. It is a matrix that shows the attributes on the y-axis and the values on the x-axis. The matrix connects the two. This tool was used to compare the responses to the collective photos. The codes will be put onto a black and white version of the photo to show both the tangible and the intangible codes. These codes will be either red (no opportunity for change), orange (little opportunity for change), or green (lots of opportunity for change).

Once every group has made these analyses for their own interviewees, the images can be combined into one large value matrix. Here, the differences and overlaps can be seen easily between the different stakeholders. Conclusions and challenges can be made from these matrices.

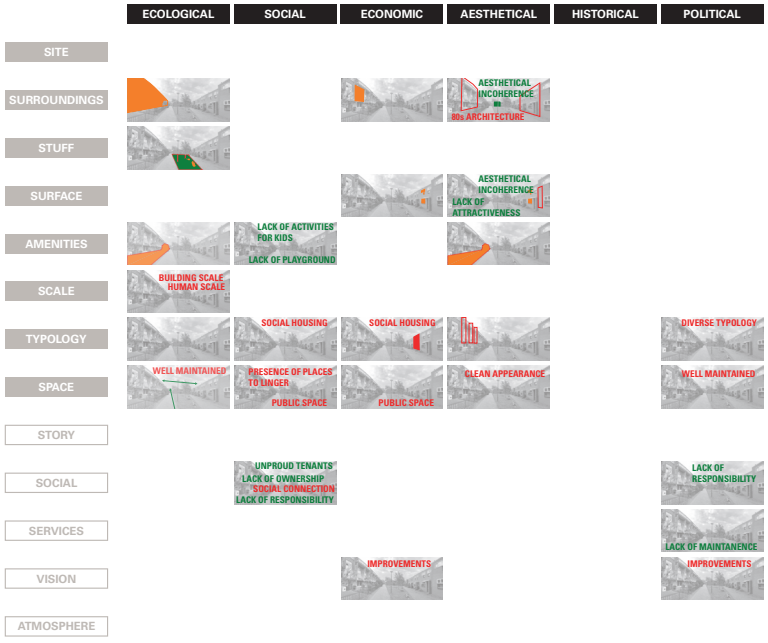


Image 11. Value Matrix - Photo 4 Owners

The values and attributes were based on Tarrafa Silva and Pereira Roders (2012) and Brand (Clarke et al., 2019). The values mentioned by Tarrafa Silva and Pereira Roders were composed from several different value sets. The list gave a well-rounded view of values that could be present in the H-buurt and functioned adequately for a first value assessment. The attributes of Brand focus on very much on the building scale. His set-up from large to small scale, however, provided a starting point. This was applied to the attributes for H-buurt. Image 11 is an example of a Value Matrix from the executed research in Hoptille, including the used values and attributes.

A second method was more quantitative. This was a table based on the previously mentioned value matrix, a value table so to say. For the table, all the attributes and values in each square of the photo were counted. These were put in the table for either attributes or values. The tables showed how much a certain topic was mentioned and therefore reflects on the significance of this topic, for example, the value ‘social’ or the attribute ‘scale’. The tables were used to understand the general focus of each of the stakeholders.

Lastly, the codes of H-buurt were determined based on the research by all the groups. The codes, in this case, are typical aspects of the H-buurt. They are specific for the three neighbourhoods and either cover a challenge or an opportunity. The codes were determined during a brainstorm and were based on the two methods mentioned above. This led to a total of fourteen codes (image 12).

All stakeholder groups reflected on the codes and define what it means to their target group. All codes were translated into icons and colour coded by the opinion of that stakeholder. This made it clear what the agreements and conflicts were. All the codes are combined in the code book. This book consists of an overview of all the icons and explanatory texts per stakeholder. The book also concludes the first research phase. It acts as a summary of the stakeholder research and hold extrinsic values of the H-buurt.

The extrinsic values, however, are not the fourteen different codes. These lie in the positions of the different stakeholders to the code. The extrinsic values for Hoptille specifically will be determined in parallel in the next phase. This will be done through the analysis of the made value matrices and of the documentation of the four different stakeholder groups.

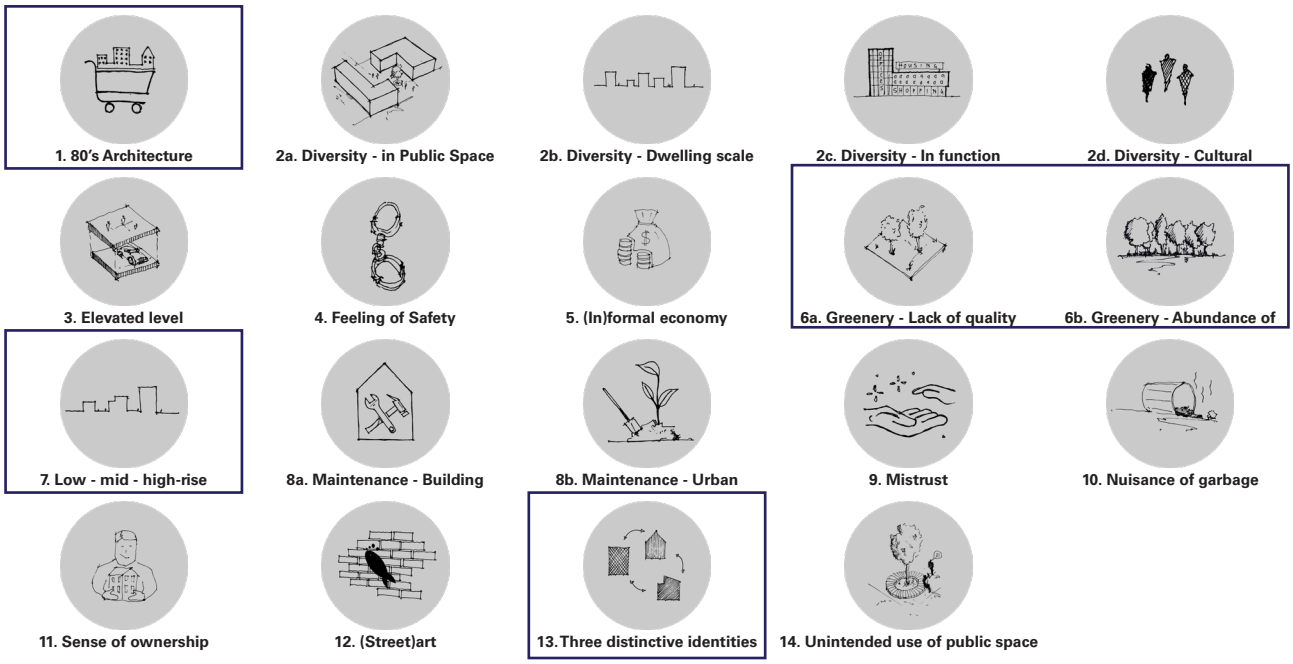


Image 12. Codes for H-buurt

My personal interest lies in the codes 80's Architecture, Low – mid – high-rise, and Three distinctive identities. These codes are architectural and combine at Hoptille. This adds to the previously mentioned reason why the neighbourhood Hoptille was chosen as a case study (image 7). Due to its relation to the global relevance of this project, theme 6 is also of importance.

2. Sustainable Development Goals (biosphere)

The pilar Ecological in the thought model covers the biosphere related SDG's. These are 'Life on Land', 'Life below Water', 'Clean Water and Sanitation', and 'Climate Action' (Stockholm Resilience Centre, 2016). In order to take these goals well into account for the project, they need to be incorporated into the concept as well, and not only drive the technical solutions.

The four SDG's are general for the whole world. For this project, so they can be related to the built environment, these topics mean biodiversity (including land and water), outdoor spaces/connections, water management, and energy performance. These can now be incorporated into the urban and architectural concept. How the four goals can be integrated in the concept, will be researched through several case studies, such as Block 6 in Berlin, SAWA in Rotterdam, and 'Cité du Grand Parc' by Lacaton &Vassal in Bordeaux. The focus of the case studies will be on the concepts behind them and the principles used.

Other case studies will also be used to research materiality and detailing. This is key in making redevelopment less impactful than a new building (National Trust for Historic Preservation, 2011). This will be in addition to research into new sustainable developments, such as improvement in properties of certain materials. This will happen later in the design process once the concept has been developed. The case studies will then be measured against this design concept so the concept can be carried through into the small scale.

3. Densification

For the third pilar, densification, a thorough analysis of all the buildings is required. This is to explore the structural properties and therefore the possibilities to use the existing. The analysis will also be used to get a better understanding of the concept and the context of the architecture. Topics to analyse are nearby amenities, previous ground use and soil type, lay-out of the types of apartments and of the dwellings, and a timeline of made alterations.

This topic will also encompass a lot of research by design. The theme will first be explored through several scenarios with impact assessments. For these scenarios, imposing what if-questions will be asked. These will be analysed through a risk and benefit assessment. Through trial-and-error better scenarios will be developed and possible design solutions are found.

These scenarios will be explored through physical and digital models. The large what if-scenarios will be made digitally, since this method is quick and rough. It allows for rapid testing of multiple options. The physical model will be applied at a later stage. This method takes more preparation time and is therefore more suitable for precise testing of possible design options.

Through addition, the relation between old and new will be studied. New additions will respond to the ‘utopia’ of the 80’s, in which the neighbourhood was constructed, and reflect on the ‘utopia’ of the 2020’s, the context in which the addition will be designed. This will be done through the analysis of several recently designed and built projects of similar scale and function. The analysis will focus on the design concepts behind the buildings, rather than the technical features.

Planning

A planning for the next year can be found in the appendix of the research plan. It is a weekly schedule showing the different tasks to be completed. It will function mostly as a guideline throughout the project so the progress can be managed.

Ethics

During the research, some ethical issues will pop up. Most of these are related to the methods used in the first phase of the research, interviewing all stakeholders. The method is based on the notion that all stakeholders matter and should be included in defining heritage. However, different perspectives give different opinions. These will contradict each other. Due to this, one must decide which opinion is more important than the others. The researcher should be aware of a possible bias and carefully reason decisions.

Furthermore, during the interviews, especially with users, the researcher must be cautious not to promise anything or make one believe decisions have already been made. It is a student project. Within the setting of the studio, the project is not to be executed. The goal is to provide input to the housing corporation and municipality. This should be clearly communicated.

Interviews relate to another ethical issue, privacy. Privacy is an important topic nowadays and as a researcher, one must guarantee the privacy of the interviewees. Names and other personal information acquired from the interviewees should not be shared, but kept within the studio group for educational purposes only. All shared reports or presentations should contain anonymised data only. Furthermore, interviews conducted online are preferably recorded for future research within the department. The interviewee should be asked for approval first off-camera, then again on-camera to document their consent.

Lastly, the current developments regarding the Covid-19 virus have an effect on the research. Partial lockdowns change the behaviour of people. They work from home, have different patterns throughout their days, and possible changes in financial situations. For example, this could skew the observations made by researchers in relation to use of public spaces. People might also be more reluctant to talk to strangers and accept research tools, such as drawing utensils. The use of other methods might be limited by having to keep 1,5-meter at all times. This should be respected and taken into consideration while gathering and processing data.

Besides the issues involving the methods, the outcome of the graduation project could also cause some ethical issues. For example, the solution might not be giving the desired effects. The project location is not positively viewed from the outside. If the projects were to be carried out, the perception of the H-buurt will change. Through urban renewal, safety and mobility can be improved and social cohesion can be strengthened. However, this can also cause influxes in property values and alter the demographics of the residents, pushing out long-term tenants with lower incomes. This gentrification of an area can lead to social exclusion and neglect social diversity (Mehdipanah et al., 2017). This is not a sustainable way of dealing with communities and should be taken into account throughout the graduation trajectory.

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SELF-ASSESSMENT

While writing this research plan, I noticed several situations, both positive and negative. It was hard to start writing the research plan at first, since I had no clue what I personally wanted to do. Therefore, it was difficult to grasp the process ahead. The studio topic is very broad and open, so one can do anything within the case study, or even outside it. Deciding on what to do in the beginning of the process was difficult while still trying to keeping an open mind towards the results of the research. The research is also partly bottom-up. This means, to me, that you should not fully try to predict what the users are going to say about their environment. If you ask people about their opinion, you should listen. Therefore, I had a hard time deciding on my methodology and topic.

The studio research case is very rich in topics and reasoning behind it. While reading the studio text, I understood the many elements involved in New Heritage. However, to write these down for myself was a bit harder. Through constant restructuring and making schemes, I grasped the argumentations that were important to me. By having to write everything down myself, I understood the goals better and also got more excited about the upcoming year. It was a confirmation that I have chosen the right studio.

The first revision of the research plan was quite extensive. The first draft was still very general and focused too much on the execution of the collective research. Up until the P1 presentations, and the draft deadline, I did not have enough time to develop my own process and focus. I was too fixated in the stakeholder research.

In the last two weeks of the quarter, however, my preferences became clearer to me and I started to like one particular location within the research case, the neighbourhood Hoptille. I believe this was due to the fact that all the stakeholder groups started to work together during these weeks and you got more insight into the other perspectives. The comparisons were very interesting, both the conflicting and the overlapping topics. I had the feeling I was starting to really get to know the area and therefore could pin point my preferences more clearly.

After the P1 presentation, there was plenty of time to reflect on the executed research. In combination with the feedback given on the draft version, it was easier to specify problems, interests, and methods. However, writing about methods is still quite difficult. Since some methods are straightforward for an architecture student, such as a physical model study, it is challenging to elaborate on these topics.

Simultaneously, the planning for the graduation plan made it clear there was little time to do any research. The hand-in of the research plan right before Christmas break skewed the relation between the plan and execution of the research. It would have been better for the process to create more time before P1 for individual interest development.

Anneloes Tilman _ 4367537 Research Plan _ AR3A010 _Appendix

PLANNING (1/2)

	Q1										Q2									
Activity\Time	1.1	1.2	1.3	1.4	1.5	1.6	1.7	1.8	1.9	1.10	2.1	2.2	2.3	2.4	2.5	2.6		2.7	2.8	2.9	2.10
Studio orientation																					
Studio selection																					
Pilot research (Almere)																					
On-site group																					
Media group																					
Stakeholder research H-Buurt																					
Makers/Academics																					
Government																					
Owners																					
Users																					
Individual Research Plan (Draft)																					
Research Plan Draft deadline																					
P1 Presentations																					
Impact Assessment (8 themes)																					
Social & Landscape																					
Densification & Economic																					
Crime/Safety & Access/Type/Multifunctional																					
Identity & Ecology																					
Research Plan revision																					
Personal analysis of all Impact Assessments																					
Toolkit presentation																					
Concept development																					
EXTRINSIC VALUES																					
Define main values and attributes																					
Test against design																					
Convert to architecture related concepts																					
SUSTAINABILITY																					
Research into SDG's																					
Concept requirements																					
Case study research																					
Material study structure																					
Material study detailing																					
HOUSING SHORTAGE																					
Further individual scenario development																					
Deep building analysis																					
Physical model (testing)																					
Layout (plans and section)																					
Define design brief																					
Research Plan deadline																					
Graduation Plan deadline																					
Make/prepare products for P2																					
P2 Presentations																					
Retakes P2																					
Reflect on feedback P2																					
Introduction BT-turor																					
Scale 1:200																					
Scale 1:100																					
Scale 1:50																					
Reflection (Draft)																					
Make/prepare products for P3																					
P3 Presentations																					
Reflect on feedback P3																					
Scale 1:20																					
Scale 1:10/1:5																					
Finalise all drawings																					
Finalise reflection																					
Make/prepare products for P4																					
P4 Presentations																					
Process final comments																					
Make/prepare products for P5																					
P5 Presentations																					

Legend

- Group work
- My trajectory
- Deadline
- *No education*

Anneloes Tilman _ 4367537 Research Plan _ AR3A010 _Appendix

PLANNING (2/2)

	Q3										Q4											Q5
Activity\Time	3.1	3.2	3.3	3.4	3.5	3.6	3.7	3.8	3.9	3.10	4.1	4.2	4.3	4.4	4.5	4.6	4.7	4.8	4.9	4.10	4.11	5.1
Studio orientation																						
Studio selection																						
Pilot research (Almere)																						
On-site group																						
Media group																						
Stakeholder research H-Buurt																						
Makers/Academics																						
Government																						
Owners																						
Users																						
Individual Research Plan (Draft)																						
Research Plan Draft deadline																						
P1 Presentations																						
Impact Assessment (8 themes)																						
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Toolkit presentation																						
Concept development																						
EXTRINSIC VALUES																						
Define main values and attributes																						
Test against design																						
Convert to architecture related concepts																						
SUSTAINABILITY																						
Research into SDG's																						
Concept requirements																						
Case study research																						
Material study structure																						
Material study detailing																						
HOUSING SHORTAGE																						
Further individual scenario development																						
Deep building analysis																						
Physical model (testing)																						
Layout (plans and section)																						
Define design brief																						
Research Plan deadline																						
Graduation Plan deadline																						
Make/prepare products for P2																						
P2 Presentations																						
Retakes P2																						
Reflect on feedback P2																						
Introduction BT-turor																						
Scale 1:200																						
Scale 1:100																						
Scale 1:50																						
Reflection (Draft)																						
Make/prepare products for P3																						
P3 Presentations																						
Reflect on feedback P3																						
Scale 1:20																						
Scale 1:10/1:5																						
Finalise all drawings																						
Finalise reflection																						
Make/prepare products for P4																						
P4 Presentations																						
Process final comments																						
Make/prepare products for P5																						
P5 Presentations																						

Legend

- Group work
- My trajectory
- Deadline
- *No education*