the metamorphosis of Ringön.
A gentle development towards the future.

Master's thesis in Architecture and Urban Design
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Ringön is an industrial area close to the city centre of Gothenburg located on the northern riverbank of the Göta Älv on Hisingen. Most of the area is owned by the municipality and the vast majority of the lease hold contracts for the single properties will end by 2025.

The main purpose of this thesis is to show possibilities for a gentle development and vitalisation as well as the opening of this industrial area for the public based on the synergy of four main aspects: inventory, preservation, development and supplement.

The inventory (current state) consists of a building structure with exciting but fenced spaces in between, large and widely traversed halls and a functioning social network between building owners, entrepreneurs and employees. The strategy involves the preservation of certain parts like e.g. the original buildings of the 1950s but also businesses with customer traffic. Development refers to changes of functions, spaces or structures of existing elements and supplement describes additionally required elements that the area is missing.

The thesis finalises with the synergy of these aspects and a concrete design for a temporary art centre functioning as a catalyst for a future development. The design shows possibilities how different new spaces within, around and between the existing building structure can be created and connected by using basic architectural elements like selective, linear and planar elements in different constellations and configurations. Other e.g. flexible elements provide transformable space.

The conclusion of this thesis is that Ringön offers a great variety of indoor and outdoor spaces which can easily be transformed into new functions other than for industrial use. Small impulse projects can be the impact for a further gentle development attracting other uses that establish further on.

The report is written in English.

**Keywords:** Ringön, metAMORPHosis, urban planning

**ABSTRACT**

Ringön is an industrial area close to the city centre of Gothenburg located on the northern riverbank of the Göta Älv on Hisingen. Most of the area is owned by the municipality and the vast majority of the lease hold contracts for the single properties will end by 2025.

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INTRODUCTION

Gothenburg is changing. Neearer else it is more consciousness than in the development area called the RiverCity Gothenburg (Centrala Ålsträdar i Sweden). Ringön is an industrial area close to the city centre of Gothenburg, located on the northern riverbank of the Östra Älv. It is part of a RiverCity development area (fig. 01).

After the oil crises in 1973 associated with the demise of the ship building industry and the harbour operations on the river Östra Älv (that nowadays are outsourced to the new harbour of Arendal) huge areas became available for the city’s development and planning. An important question is how to deal with the industrial remains of the harbour era with their structural and social coherences due to the encountered utilitarian condition.

In 2010 the municipality of Gothenburg decided that the RiverCity development area (fig. 01). The core of the vision is based on three strategies which are “Connect the City”, “Embrace the waterfront” and “Reinforce the center” (City of Gothenburg, 2012a+b). These strategies are “Connect the City”, “Embrace the waterfront” and “Reinforce the center” (City of Gothenburg, 2012a+b).

The second question refers to a specific site within Ringön and what can be done starting today.

The overall goals are a sustainable development, the maintenance of the existing, strengthening the community, activation of the area and accessibility for the public.

The main purpose of this thesis is to show possibilities for a further gentle development attracting new users within Ringön.

The strategy and exploration of this thesis is divided in six basic parts which are named CONTEXT, INVENTORY, PRESERVATION, DEVELOPMENT, SUPPLEMENT and SYNERGY.

The inventory (current state) consists of a building structure with existing but fenced spaces in between; large and widely traversed halls and a functioning social network between building owners, entrepreneurs and employees. The strategy involves the preservation of certain parts like e.g. the original buildings of the 1950s but also businesses with customer traffic, traffic development refers to changes of functions, spaces or structures of existing elements and supplement describes additionally required elements that the area is missing.

The thesis finalises with the synthesis of these aspects and a concrete design within three existing buildings. The design shows possibilities on how different elements can be connected by using basic architectural elements like selection, linear and planar elements in different constellations and configurations. Others, e.g. flexible elements, provide a transformative space.

The conclusion of this thesis is that Ringön offers a great variety of indoor and outdoor spaces which can be transformed into new functions other than for industrial use. Small impulse projects can be the impact for a further gentle development attracting other uses that might establish further on.

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MAIN QUESTION AND OBJECTIVES

This thesis follows two main questions. The first question refers to the urban development of the whole district area and investigates possible impact points from which further a development can spread.

WHAT CAN AN URBAN STRATEGY LOOK LIKE TO ENABLE RINGÖN A GENTLE DEVELOPMENT?

The second question refers to a specific site within Ringön and what can be done starting today.

HOW CAN ARCHITECTURE CREATE NEW SPACES WITHIN THE EXISTING (BUILDING) STRUCTURE OF RINGÖN?

BACKGROUND

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METHOD

The method is a three phase process. The first phase is the gathering of information about Ringön and what can be done starting today.

The second phase is the analysis and interpretation of the gathered information. The analysis and interpretation of the gathered information is the focus of this thesis.

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The overall goals are a sustainable development, the maintenance of the existing, strengthening the community, activation of the area and accessibility for the public.
The concept of this thesis, denoted as "The Transformation of Ringön from its current state as an industrial area into a post-industrial area with multifunctional, public, non-profit and commercial uses and open spaces."

This transformation adopts a bottom-up strategy instead of a top-down strategy providing a gentle and sustainable development for Ringön.

To specify this concept some terms have to be delimited in advance.

A top-down strategy in general is meant to be a system that breaks down from a superstructure to various sub-systems.

In case of a planning directives level and adapted to the current situation of the majority of the urban planning projects of Gothenburg, the city is on top formulating a superior development, the national interests. The first subsystem is the county formulating a regional development followed by the municipality as the second subsystem formulating a local development. These directives are outlined in the Comprehensive Plan for Gothenburg (the GPP). The city is thus subdivided in various departments and associations that are detailing the local development superstructure.

The lowest subsystem represents the investor or building company who executes the decisions. Each decision maker within the existing directives is involved in and resources of Ringön while the top-down strategy comes into play integrating the existing, available resources and starting a process from the inside.

The bottom-up strategy serves as a useful tool to involve the local stakeholders as well as private persons (e.g. artists, inhabitants) as an active part not only with their opinion in public surveys but also as decision makers within the existing directives. The concept of a bottom-up strategy uses the possibilities in and resources of Ringön while the top-down strategy defines the general framework.

Starlings pointed the suggested development are single pre-existing elements within Ringön being suitable to a temporary conversion having a potential to function as a catalyst for a future development of Ringön. The first step is to identify the local stakeholders, building owners, and possible or cultural groups. The demolition of the existing buildings would provide diverse and flexible spaces inside and outside. The possibility of a gentle development for Ringön to coexist with the historical heritage, the cultural and public buildings and places and to assign changing or new functions to them due to altering circumstances.

The idea behind this approach is that the public availability provides an impulsion to impact a development that otherwise would continue further on and becomes a permanent use. A temporary use can also attract other uses of the same or other sort that may establish later on. In this entire process time is a crucial factor but it offers the possibility of a gentle development for Ringön to grow from inside considering the identity of Ringön and its current development.

The combination of private and public ownership, a mixture of producers, craft and trade along with cultural, social and public activities will lead to win-win situations due to the fact that these would be more attractive for different generations, social or cultural groups. A gentle development provides manifold opportunities to control the development on the one hand while public needs emerge over time. It also provides possibilities to intervene in case the development leads to unwanted results. A gentle development is more flexible. Over time the changes can be evaluated and new ideas can be incorporated. As urban planning is a complex system with many stakeholders. A gentle development provides enough time for public and private interest groups as well as an investing public to establish and find common instruments for organizing and financial backing have the already existing companies the possibility to intervene in the process means that many people like employees, private and business customers, business owners or suppliers as well as business owners, property owners and leaseholders are involved in the area. In the meanwhile, apart from an industrial purpose, also musicians, artists, some in official residents and inhabitants on residential boats can be found in the area. There is a wide range of different businesses, services and companies, restaurants, an animal hospital or a second-hand shop run by the church of Syrians that are located in Ringön. All those local stakeholders have a strong interest in the development of Ringön and are willing to participate in the process as well as to investigate in their future.

Advantages of a gentle development

The biggest advantage for the municipality is to use Ringön as a kind of test site for a certain period of time, at least for the next 20 years, to pursue new ways in the strategy of transforming an industrial area gently into a post-industrial district of the city. The combination of private and public ownership and its future. The biggest advantage for the municipality is to use Ringön as a kind of test site for a certain period of time, at least for the next 20 years, to pursue new ways in the strategy of transforming an industrial area generally into a post-industrial district of the city involving and closely working together with the local actors. This would generate know-how and expertise for the municipality and could be adapted to other industrial areas or areas that are in need to be developed. On the other hand people become active decision makers as well as a catalyst for a future development of Ringön. The first step is to identify the local stakeholders, building owners, and possible or cultural groups.

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The concept of this thesis is to follow a bottom-up strategy instead of a top-down strategy. This graphic shows and compares these two opposing strategies and points out at which point the intervention between the strategies might proceed.
Urban planning strategies involve a great number of stakeholders and different institutions (fig. 4), including an elaborate coordination and soliciting plan (Burgi Nagli Rechtsanwalt, webmin). That means all these stakeholders with their professional expertise should be part of the discussion and process in order to avoid misplanning and to provide for all contingences. Centrala Älsetaden as the municipal institution guiding the development of the RiverCity is already onling many of these experts and is in close dialogue with other associations, for example the River Bank Development INC. (äkaderen, Hustvekt). Mista Urban Futures, the property owners (Ringöns Fastighetsägarförening) and many others.

It can be stated that Centrala Älsetaden is closely related to the concept called governance.

"Governance is the enabling environment that re-quires adequate legal frameworks, efficient political, managerial and administrative processes, as well as the mechanisms, schedules, and feedback and oversight of the local government response to the needs of citizens. It is in fact a process of decision-making that engages various actors with different priorities to ensure that rules are made and enforced, development is realized, and issues and possibilities.

Furthermore, the strategy of this thesis is influenced by the concept of Newfield re-development. Within the European Union, there is a broad number of institutions and organizations as well as funding that address and conduct research with the re-development of brownfields.

Brownfield sites are sites that have been affected by the former uses of the site and surrounding and, are derelict or underused, may have real or perceived contamination problems, are mainly in urban areas and require intervention to bring them back to beneficial use.” (EGURIS). Other definitions relating to brownfields can vary within the national or regional context within the European Union. In Germany, the definition is more related to a previous user: "inner city buildings not under use, inner city areas for redevelopment and refurbishment" (Umweltbundesamt Berlin).

Even as the area of Ringön does not fit exactly into those definitions, the concepts and strategies of brownfield re-development can in parts be adopt-ed for and involved in the development process of Ringön. In summary it can be stated that the main goals of brownfield re-development adapted to the situation of Ringön are changes in the use of the area as well as the creation of values, diversity and density. As a result, Ringön will be activated as a mixed city district and be more attractive for the common public.

Starting the process towards a post-industrial area the changes in the use of Ringön apart from a pure industrial use might be temporary uses, private or personal uses, non-profit uses and other economic uses.

The different uses are connected to certain terms of use that need to be discussed and legally stated both in a short-term and a long-term perspective. It is impor-tant that the types of uses are clearly determined and that the pattern of utilization will be developed to-gether with the local stakeholders. Further questions like the right of use, the utilization of resources as well as the degree of building coverage, the density of built use and the level of built development have to be specified in advance in order to provide security for future investments. To put a concrete planning proc-ess in motion the general land-use type and specific land-use type has to be finalized and encroachments on the exercised uses need to be possible.

The creation of density is rather a question of increasing the number of social facilities, services or retail as well as culture and leisure activities. The manifestly the programme, the more people will be involved in the development and the more will be attracted to the site. Furthermore, this will lead to a higher grade of economical, ecological and so-cial sustainability and a higher grade of resilience. Density is also a matter of concentration and short issues.

Social values like public spaces, social integration, welfare and justice break down social barriers and segregation. It is a matter of bringing people together and offering opportunities to meet. The creation of cultural values like expression and education promote knowledge and the (intellectual) exchange of ideas represents an important orienta-tion for the society and is also promoting the integra-tion of various cultural groups.

The improvement of the hard and soft location factors will moreover increase the attractiveness and quality of Ringön as an enterprise location.

In order to accomplish a mixed use area the creation of diversity affects the number of uses and functions within the area for various social and cultural groups and generations, the amount of places and imple-mented buildings as well as economical and ecologi-cal diversity. Urban life mainly works as a result of this diversity and the possibilities an area offers to eclectic demographic groups.

Density is not necessarily related to a high building development. Measures improving the economical values and the support of small-scale businesses will lead to higher tax revenues, income and more employment.

Ecological values like recreation, health and protec-tion generate a counter part to the commercial use and improve the physical and mental sense of well-being. Therefore the recovery of green space is an important issue.

Secondly, the support by and the cooperation with the municipality is a crucial necessity. The strategy and process needs to be transparent and public. On a planning level and in regard to investments, cer-tain securities have to be guaranteed in order to gain willingness and risk-taking of the local stakeholders or others willing to invest. This includes securities in the proceedings, time schedule, financing (potential start-up funding), building permissions, sanitation, environment protection and durability.

Of course, there are also impediments connected to this strategy. The high risk for investments, lack of financing and uncertainties of the structural qual-ity of the area (and regulation), contamination and pollutant burdens as well as lobbying and capitalistic interests eliminating smaller competitors have to be taken into account.

The macro location factors of Ringön like the growing population and the expanding economy of Gothenburg as well as the micro location factors like the connec-tion to the public transport and the transregional highways, the accessibility to the river Göta Älv, the close distance to the inner city and the promitionally effective visibility of Ringön constitute an outstanding point of departure for the future development.
One of the basic requirements in urban planning is a detailed and profound knowledge about the area that shall be developed, its surroundings as well as the local and superior coherences.

The strategy of this thesis is divided in and consists of six categories that are exploring different levels and scales of the design process for Ringön focusing on different aspects as shown in the diagram (fig. 05).

The comprehensive plan ÖP99 as well as current ongoing plans are parts of research for design identifying basic principles between offering ideas for a future development. Last but not least concludes the category SYNERGY with a specific project on the site with a proposal. The method for the last step is based on research by others.

The Comprehensive Plan and the Vision for Älvstaden build the framework of the superior development of the RiverCity of Gothenburg. The strategy of this thesis intervenes on a district level. Once the direction of the superior development is clearly determined in a top-down process this strategy jumps back to the local conditions and individual elements of Ringön closely examining possibilities on how the superior goals can be achieved through a bottom-up strategy.

The guiding question here is how space can emerge and how different architectural elements can exist together. The idea for the project is to create new spaces within the chosen existing buildings by implementing basic architectural elements without changing the building structure. The focus of the project is on showing how space can emerge and how different architectural elements correlate with each other and our perception.

The guiding question here is, are the industrial objects that need to be displaced or can they be seen as a useful resource and basis for a future development? The guiding question here is how public space can be improved and used in different ways and which functions are able to animate and crowd the streets.

There are four approaches that are addressed like an example on how the execution of the concept of a gentle development could be proceeded using the pre-existing structures and getting the result.

The guiding question here is the current road system, a potential secondary road for pedestrians, the accessibility of the river bank and the creation of public squares with different functions.

The Comprehensive Plan and Ringön's art gallery Järnhallen gives an example on how the execution of the concept of a gentle development could be proceeded using the pre-existing structures and getting the result.

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The guiding question here is the current situation and existing stock of Ringön in depth mapping out the most crucial elements and local coherences.

The comprehensive plan ÖP99 as well as current ongoing plans are parts of research for design identifying basic principles between offering ideas for a future development. Last but not least concludes the category SYNERGY with a specific project on the site with a proposal. The method for the last step is based on research by others.

The Comprehensive Plan and the Vision for Älvstaden build the framework of the superior development of the RiverCity of Gothenburg. The strategy of this thesis intervenes on a district level. Once the direction of the superior development is clearly determined in a top-down process this strategy jumps back to the local conditions and individual elements of Ringön closely examining possibilities on how the superior goals can be achieved through a bottom-up strategy.
This project was introduced at the IFHP World Congress in Gothenburg, which I attended in September 2012, by the authors Hans-Jürgen Pröpper and Construction Cord Swoblik. It is an excellent example on how a bottom-up strategy was used as a tool for the municipality to lead to a sustainable urban development.

1991 the French military left the southern part of the Tübingen. That was the great opportunity for the city to develop a 60-acre strip that used to be an underprivileged neighbourhood. Until that time, the southern part was defined by the following three factors. First, large areas were marked by special uses like the barracks as inaccessible “city within a city.” The height depot, the depot, the large hardware stores and supermarkets, the municipal utilities etc. Second, the State Road 27 connected the southern part of the city into one part, between which there were only a few compacts. And third, the southern part of the city was separated by multiple barriers. The Neckar River, the railway and the highway 28 make the Südstadt popularly known as: “the Kingdom Come.”

After an urban design competition, the city of Tübingen and the competition winner Lehnen drei Architekten together developed a master plan for the city of Tübingen. That was the great opportunity for residents and employees and only secondarily for residents and employees and only secondarily for residents and employees. Until that time, the Südstadt development. Two principles play a major role. First, the creation of a decentralized, neighborhood-oriented and small scale structure, and second, the use of private resources. The city invested about 15 million Euros in infrastructure, planning and coordination of public institutions. The urban concept provides a dense and fragmented City block. Almost all old buildings are preserved and renovated. The majority of the area is built by private building communities planning their own projects on their own specifications and im- plement. Roads and squares are mainly low houses, with the exception that employees and only secondly the commercial spaces on the ground floor. Furthermore, the Südstadt development. Teng Kun-Yen is a Taiwanese architect and artist who came to Shanghai and in 1997 he rented an old ware- house building. His project was transformed into a studio for his own purpose. I met Teng Kun-Yen at a lecture he gave at the Technical University of Vienna in 2007 and I was impressed by his strategy on dealing with the historical heritage of the warehouses and factories of the late 19th and early 20th century. The aim is to protect them from demolation. This case study rep- resents a good example of how modern interventions are transformed into public value and save the historical heritage for the future. Furthermore, certain simi- larities of prerequisites concerning area restrictions of Rüngin can be found.

In the beginning of the 20th century the Suzhou River was an important route for the inland waterway transport as well as for trading and so many busi- nesses and factories established along the river- banks. Also huge areas of warehouses emerged by that time. Those areas are mainly characterized by a building style of the 1920s and 1930s (UNESCO, web- site). Since the reform era in the late 1970s, many companies moved away from the area and the fac- tories of the industrial remains and his efforts to rethink their plans concerning the redevelopment of the area. Like in Rüngin the low rents, transformable spaces as well as the architectural styles were mostly re- sponsible for the attractiveness of the area for the artists and designers. Another similarity is the fact that the majority of creative production didn’t comply with the areas official purpose for industry or manufacturing. The activities in the area are more or less tolerated by the authorities. Furthermore, the tenants face an un- certain future which makes them deny any extensive investments. The development of the Suzhou River area and M50 is still in process and an end is not yet in sight.

The warehouse Teng Kun-Yen rented was formally an old grain warehouse built in the 1930s. The facade appears in Art Deco Style and the exterior walls are made of red grey bricks while the buildings skel- eton and floors consist of wood. The roof is tiled with red tiles (UNESCO, 2007). Being able to renovate the building as close to the original condition as possible, Teng Kun-Yen collected similar materials from demolished buildings of the same period. Necessary changes and new elements were strictly and visually separated and allow, the structure as well as the materials like concrete were used. To save the painting the tin roof of the building the exposure of the lower and upper walls with water damage on the walls were left unchanged.
Observing the urban development of Gothenburg, a highly recurring phenomenon can be realised. Urban building projects are often executed as big scale projects through a few companies. Often, whole areas get demolished and redeveloped: As a result of this, those areas are withdrawn from a natural, careful and coherent development of the city and appear as monotonous constructions within the townscape. This is especially obvious on the northern river-bank of the river Göta Älv on the island in districts like Eriksberg, Sannegårdhamn, Lindholmen or Nya Kvillebäcken. Huge housing projects have been realised which are missing a natural connection to their surrounding.

I have chosen Nya Kvillebäcken as a case study because its development signifies a kind of urban development having a far-reaching impact on its surrounding and commuting area. It is my personal opinion and experience and for me it is a negative example how the development based on investors’ interests can lead to social and structural exclusion and segregation.

Nya Kvillebäcken is an area north-east of Rinön that had a certain similarity in its initial situation to Rinön nowadays, even if the situation in Rinön appears to be much more.

The area of Nya Kvillebäcken, which is still under construction and was introduced by Gabriella Olshammar (2002) as Gustaf Dalén Area, is bounded by the highly frequented Hjalmar Brantingsgatan in the south, Fågélägsgatan in the north and Fjäringsgatan in the west. In the east there is the small river Kvillebäcken that flows through a green strip that will be retained as a park and marks the eastern border of the new housing area. In the following I will name the area Gustaf Dalén Area according to Olshammar but then I will switch to Nya Kvillebäcken to point out the new development as it is already in process.

The Gustaf Dalén Area was known as a “living urban environment with a large mixture of businesses” (Olshammar, 2010, p.79). To give a short historical overview, the area was established in the beginning of the 20th century as an industrial area. According to Hilge Holgersson (2014a) and Gabriella Olshammar (2010, 2013), during the 1930s and 1940s small metal workshops and paint factories were located in the area, replaced by service and retail companies in the 1950s while in the 1970s small factories for tin ware and paint factories were located in the area, shops and paint factories were located in the area, shops and paint factories were located in the area. Consequently, the property developers Wallenstam and NCC, who owned most of the land, were set in motion. In 1979 a proposal was given by the city planning administration concerning as Olshammar accounts it, “the current small-scale and mixed building area is worth continuing to build on.” But these plans were never realised because of new assignments that the city planning administration got and mainly because of the property developers who had basically no interest in these plans. Subsequently a new, more developer-friendly proposal was presented by the city planning administration in 2002 proposing a complete conversion of the area with new buildings. But again those plans ended just in talk. Last but not least the new development was linked to an extended project of the municipal Älvstranden Utveckling Company in 2002 (Olshammar 2010).

Today, the whole area is divided in fifteen different squares that are developed by seven different companies. These are Derome, HSB, NCC, Ivar Kjellberg, Wallenstam, Verdieck and Bosabäcket.

Already in 1970s, the area was estimated to be declaring and in 1986 the municipal council classified the area as a slum that is in “hand of being sold in order” (Olshammar, 2010, p.76). Due to Olshammar, different initiatives, mainly from the planning and building committee, the city planning administration and the property developers Wallenstam and NCC, who owned most of the land, were set in motion. In 1999 a proposal was given by the city planning administration considering as Olshammar accounts it, “the current small-scale and mixed building area is worth continuing to build on.” But these plans were never realised because of new assignments that the city planning administration got and mainly because of the property developers who had basically no interest in these plans. Subsequently a new, more developer-friendly proposal was presented by the city planning administration in 2002 proposing a complete conversion of the area with new buildings. But again those plans ended just in talk. Last but not least the new development was linked to an extended project of the municipal Älvstranden Utveckling Company in 2002 (Olshammar 2010).

Today, the whole area is divided in fifteen different squares that are developed by seven different companies. These are Derome, HSB, NCC, Ivar Kjellberg, Wallenstam, Verdieck and Bosabäcket.

Displacement

Overall, in a period of three decades as Helena Holgersson (2014) points out, “no political agreement was reached regarding the future of the area” and Gabrialla Olshammar (2002) in her conclusion characterised the area “to be a case of a permanent provisional state”.

Why was it so? Olshammar (2010) explains it by the fact that small businesses, associations and immigrants were never included because of new one-year contracts. The reasons for that were on the one hand that the municipality only accepted time-limited business for profit has made demands on politics much to the chagrin of a socially sustainable solution.

In conclusion it can be said that the Gustaf Dalén Area never really had a chance to develop in a direction that would have included the former social networks and communities. It seems that once more the variability for profit has made demands on politics much to the chagrin of a socially sustainable solution.

For me personally, Nya Kvillebäcken appears like a big squared housing fortress consisting of many tightly packed orthogonal boxes. The streets are developed as pure serving streets with basements mostly for entrances and driveways.

The court yards between the new buildings can mostly only be entered by climbing stairs signifying an exclusion of the public. In fact, one appears kind of suspicious walking through the court yards not being a tenant in the area.

The few spaces for commercial use in the basement corner of some buildings are unrelated to each other, widely spread and small-scaled. There are no more spatial possibilities for other businesses to establish and therefore, the commercial use will be limited to a local supply.

It is hardly probable that Nya Kvillebäcken will be much socialised by a wider demographic group but the residents of Nya Kvillebäcken, Katarina Despotovic and Catharina Thörn have closely documented the development of Nya Kvillebäcken scrutinising the process from a sociologically point of view (see Despotovic, Thörn, 2015).
HISTORY OF RINGÖN

1800
- Tingstadsvassen was a large reed area

1870
- Start of filling up the Tingstadsvassen with excavated soil

1874
- First bridge to Hisingen (swing bridge)

1878
- Göteborg buys Tingstadsvassen for 275 000 SEK
- Start of construction of the canal Ringkanalen

1879
- Decision for a new harbour in Tingstadsvassen, Perns and a harbour jetty

1890
- Lundbyvassen develops besides the bridge ahead of Hisingsbron
- Götaverken is established
- Tingstadsvassen gets drained through Ringkanalen
- Ringön bordered by Ringkanalen and Kvillebäckskanalen

1906
- Incorporation of Lundby into Göteborg

1917
- Lundby as part of Göteborg's harbour and industry

1912
- Plan for Ringön basins, Ringkanalen and Frihamnen
- Johan Gustaf Richert

1914
- Opening of Göteborgs Hornvobana: Göteborg-Tingstad-Sannegårdens järnväg

1916-1922
- Construction of Göteborgs Frihamnen

1920s
- Small airport with two aeroplane hangars
- Canal used for hydroplanes

1922
- Dedication of Frihamnen by prince royal Gustav Adolf

1923
- Bus line passing Frihamnen, Knallefjärget, Lundby

1925
- Dedication of new harbour railway

1930s
- Functionalism obtains entry
- Modern, rational harbour buildings
- New tram station Hjalmar Brantingsplatsen
- Growing of small wharfs and workshops on Ringön

1939
- Dedication of Göta älvbron, with tram connection

1950s
- Until 1950 only reachable by train or boat
- Mostly compartmentalized development
- Functionalistic implementation
- Strict simplicity in expression
- Function before aesthetic

1950
- Gotenius Varv

1951
- Dedication of Lundbyhamnen
- Construction of first street in Ringön

1958
- Långholmen (50 built) (beki)
- Replenishment of Ringkanalen finished

1960s
- Lindby was a significant harbour
- Ringön so far a slum and ship graveyard
- Decision by Göteborg to build an industrial area for storage and small businesses on Ringön
- Great interest for properties on Ringön
- Demolition of old shanties and shakes
- Flattening of the reed fields
- Demise charters till 1985
- Many maritime services moved to Amiral (11)

1966
- Opening of Abodergabron (11-08)

1968
- Opening of Tingstadslunneln (83-29)
- Demolition of swing bridge

1973
- International Oilcrises

1979
- Lindbyhamnen, Science Park
- Erstbergskajen
- Decrease of industry -> event city (Evenemangsstad)

1985
- New Detaljplan for Ringön, demise charters expanded till 2025

1989
- New Frihamnen as a free harbour expires (due to Sweden’s accession to the EU)

1994
- Status of Frihamnen as a free harbour expires (due to Sweden’s accession to the EU)

1970s
- Begin of the harbour crisis (Varvskrisen)

1980s
- Lindbyhamnen
- Eriksbergskajen
- Decrease of industry -> event city (Evenemangsstad)
In the following sections, natural results will be pointed out that seem to be crucial to understand the context and current situation of Ringön and have to be taken into account in the future development.

**GEOLOGY**

The examination of Gothenburg’s underground from the Geological Survey of Sweden (SGU), which is an agency that investigates Sweden’s bedrock, soil, and groundwater, shows that beneath the area of Ringön rock can be found not until a depth between 20 and +50 meters (fig. 26). Above the rock prima- and groundwater, shows that beneath the area of Ringön, alt1, there is a deposit of gravel and sand down to the level of gravel, sand, broken brick or construction waste. In the reports due to recent building projects more comprehensive investigation about the overall distribution of the artificial fill is not available. Merely for high-rise constructions and expensive foundations will be necessary as well as drainage and structural measures protecting the underground water. These uncertainties pose a high financial risk and require high investigations.

**RISK OF FLOODING**

The topological situation of Ringön entails a severe risk of being flooded during high water (fig. 28). Large parts of the territory and almost all built-up areas are below the level that the city has set as a planning point (Sweco, 2013). As a consequence the canal started to be filled up in the 1930s and was finished in 1958. Until 1950 the area of Ringön became an island surrounded by traffic. A detailed and soil compaction in many parts of the area will be necessary in order to prevent ground subsidence. Furthermore, the traffic is a major source for noise pollution, exhaust gas pollution and fine particulate matter that impact the ecological quality of Ringön.

**TRAFFIC**

Lundbybron is one of today’s most frequented traf- fic routes in the overall road network of Gothenburg connecting to the E6, E20 and E45. It is furthermore the main highway leading to the harbour and the city of Gothenburg, connecting to the E6, E20 and E45. The number of vehicles passing Lundbybron in the West is about 27,000 vehicles and Hjalmar Brantingsgatan pass between 19,000 and 37,000 vehicles per weekday (Vägverket, 2008, Del 1, p.7). The amount of vehicles pass the road/rail (black) [del1] road/rail (red) [del1] road/rail (green) [del1] road/rail (blue) [del1] road/rail (purple) [del1] road/rail (orange) [del1] road/rail (yellow) [del1] road/rail (pink) [del1] road/rail (light blue) [del1] road/rail (light green) [del1] road/rail (light purple) [del1] road/rail (light orange) [del1] road/rail (light yellow) [del1] road/rail (light pink) [del1] road/rail (white) [del1] road/rail (gray) [del1] road/rail (black) [del1] road/rail (red) [del1] road/rail (green) [del1] road/rail (blue) [del1] road/rail (purple) [del1] road/rail (orange) [del1] road/rail (yellow) [del1] road/rail (pink) [del1] road/rail (light blue) [del1] road/rail (light green) [del1] road/rail (light purple) [del1] road/rail (light orange) [del1] road/rail (light yellow) [del1] road/rail (light pink) [del1] road/rail (white) [del1] road/rail (gray)
In the future the traffic density will further increase due to the future development of the RiverCity and therefore the emergence of new residential areas, jobs and businesses. The expansion of the Arenal Harbour will also contribute to rising freight traffic both on the road and rail (Vågäker, 2008, Del 1).

Within the area of Rönin the main street Ringgatangen is the busiest street with 6,500-9,300 vehicles per weekday (Süvar, 2013, p. 14, Bild 32).

PUBLIC TRANSPORT
The closest tram station of Rönin is Främre in the west, approached by the tram lines 5, 6, 10 and 13. The only bus connection to Rönin is the bus line 47 with stations along the main street Ringgatangen (fig. 32).

In the north-west of Rönin the biggest traffic hub for public transport Främre Ringgatangen is located. It is approached by 6 tram lines, 26 regional express bus lines and 7 regional express express bus lines (Kvallstraf, web-site) with 30,000 boardings per day. In total 75,000 passengers cross the Vänsterlänken per weekday (Vågäker, 2008, Del 2, p. 26).

The striking distance of Rönin to Hjalmar Brantingsplatsen (Vägverket, 2008, Del 2, p. 26).

The striking distance of Rönin to Hjalmar Brantingsplatsen (fig. 32). The public transport is illustrated by fig. 34 Gothenburg-Stockholm, fig. 35 New tram depot, fig. 36 New bridge Hisingsbron (fig. 37). The new bridge will be constructed east of Göteborgsbrukstaden (Stadsbyggnadskontoret, 2013) and will affect the area of Rönin as the public traffic infrastructure will have to be rebuilt and newly organized.

The RELEVANCE OF SHIPPING, SAILING AND THE HARBOUR NOWADAYS
The shipping industry has been one of the major industries in the 20th century in Göteborg. It shaped the cityscape of Göteborg and especially theidentity like no other industry. Nowadays the meaning of the shipping industry in the inner port tends to drop to zero. With the successive removal of the industrial shipping plants an important part of Göteborgs industrial history and heritage will visibly disappear. By solving and demolishing the old harbour cranes and flooding decks which until today have characterized the cityscape also important landmarks will drop away. But it is not only the visual liaises, it is more over the special atmosphere of a silent and sedate bustle of harbour activities that accompanied the Göta Älv over decades.

The last witnesses of the great ship building era of the Göta Älv will still be located in Göteborg. Gentoo Varius is the last active shipyard in the inner port area of Göteborg.

Besides the shipping industry the river Göta Älv/Vara 1953 still features prominently in the inland waterway transport especially for merchant shipping from Göteborg to the lake Vänern (Traffickort, 2013). In 2012, 2950 cargo ships have passed Götaälvsläden, 685 with an opening of the bridge, 583 without an opening (Traffickort, 2013, Bilaga E+F). Those pass-bys will increase in the future as the amount of goods within the Vänertrafiken (Shipping on the lake Vänern), which is of national interest, will increase. Another important point is the canal system connecting Göteborg and Stockholmsfjorden (fig. 34). The river Göta Älv is not only important for the inland waterway transport but also has a great historical value and is an important route for private and leisure boats. Former investigations of the boat traffic along the river Göta Älv have acquired more than 3500 private boats per year (Stadsbyggnadskontoret, 2013, p. 21).

During the peak season in 2008 the average number of boats that passed the bridge Götaälvsläden were 173 pass-bys per day (fig. 33) (Traffickort, 2009, p.12). In the description of the deltagare for a new bridge a waiting area for (sailing) boats higher than 12m (bridge opening required) or guest harbour for stays over night and longer is recommended on both sides of the bridge with a capacity for at least 80 boats. On the downstream side the already existing guest harbour in Lilla Bommen can be used as a stopping place. For the upstream side, such a expanding area is missing and could be implemented at the waterfront of Rönin, both for short term and long term visits (Stadsbyggnadskontoret, 2013, p. 21).

NEW TRAM DEPOT
A new tram depot is planned straightly south of the red track Kalleborgaffären (fig. 30) (Stadsbyggnadskontoret, 2013) and will affect the area of Rönin in the way that an additional barrier will occur. But depending on the technical design it could also provide possibilities concerning a car park situated on top of the building, acoustic shielding against traffic noise from the highway or the connexion or inclusion of a tram line through Rönin.

NEW BRIDGE
The current bridge Götaälvsläden has passed its prime of life and will soon be replaced by a new bridge, the Hisingsbron (fig. 37). The new bridge will be constructed east of Götaälvsläden (Stadsbyggnadskontoret, 2013) and will affect the area of Rönin as the public traffic infrastructure will have to be rebuilt and newly organized.

COMPREHENSIVE PLAN ÖPPN
The Comprehensive Plan ÖPPN is a, in parts, binding directive issued by the municipality for the development of the Göteborg region. The ÖPPN is subdivided into different parts whereas the first part, “Principles and strategies”, covers 13 strategic questions determining their respective goals. The second part, “Use of land and water”, consists of legally binding regulations for both the land use and the use of the water areas. This part furthermore provides recommendations, municipal guidelines as well as policies for the development of Göteborg and its region. The third part, “National interests, environmental and risk factors”, lastly includes issues like the treatment of the natural and cultural environment, infrastructure, industrial production, energy generation or waste management and so forth, that are of national interest. The last two parts “Impact assessment” and “Consultation statement” conclude the ÖPPN analysing and evaluating the given strategies and specifications (Stadsbyggnadskontoret, 2009).

In the following some important points of the ÖPPN are quoted that need to be considered in a future development of Rönin (example) and that are in accordance with the proposals of this thesis (Stadsbyggnadskontoret, 2009b).

- “…There is a need to develop the area even further. That can be achieved through a good transport network.” (p. 7)
- “…Good opportunities for recreation […]” (p. 7)
- “Access to property, sports and play, and membership to clubs and societies shall increase.” (p. 7)
- “…Cultural environments have an enormous pow- er of attraction […]” (p. 7)
- “Valuable and irreplaceable natural and cultural heritage should be preserved, enhanced and made accessible.” (p. 7)
- “Building in existing built up areas minimises the risk of being left with half-completed, less attractive areas.” (p. 8)
- “…Future development is planned to take place in central renewal areas.” (p. 8)
- “…Making the region’s centre larger, more accessible and more attractive.” (p. 8)
- “…Creating places that are alive throughout the day.” (p. 8)
- “…New development and re-development will con- tribute to increased diversity and vitality […]” (p. 8)
- “Urban renewal, […] must first occur in areas that can be provided with good public transport.” (p. 10)
- “…New development needs to respect the charac- ter and cultural heritage of existing development.” (p. 10)
This map illustrates how commercial, leisure and cultural activities are spread over Gothenburg in relation to the centre of Ringön.

PROJECT GROUP CENTRALA ÄLVSTADEN
RiverCity Gothenburg – Current Development

The project group Centrala Älvstaden works intensively on the development of the northern and southern riverbank of the Göta Älv. Among others four important events have been held since 2010 containing the development of Ringön:

- Opening of the information pavilion Älvrummet (autumn 2010) (Älvrummet, website)
- International workshop RiverCity Gothenburg (summer 2011) (City of Gothenburg, 2011)
- Citizen Dialog (autumn 2011) (Centrala Älvstaden, website; Social resursförvaltning, Göteborgs Stad, website)
- Workshop “The Spontaneous City In Ringön”, Gothenburg Property Management Administration of the City of Gothenburg (Fastighetskonsortet), Urhahn/Borra and International Federation for Housing and Planning (IFHP) Congress (Sept. 2012) (Fastighetskonsortet et.al., 2012)

The current vision for Ringön by Centrala Älvstaden is reading in the following way:

“At Ringön, various businesses currently exist side by side. This diversity will be utilised and reinforced. The area will be developed under its own power at the same time that scope will be created for industry – enterprises that are at the leading edge as well as enterprises that are more conventional. The range between the new enterprises at Frihamnen and the existing enterprises at Ringön is an important contributing factor in the development process. There will be old and new, expensive and less expensive. Alternative forms of housing, such as houseboats, will be accommodated at Ringön.”

(City of Gothenburg, 2012b, last page)

PLACES OF ACTIVITIES

When comparing the amount of places of public activities on Hisingen with those around the City Centre, it is obvious that there is a clear qualitative and quantitative difference between these two urban areas as illustrated in fig. 37.

While the commercial activities in the inner city take place in related and widely spread shopping streets, the commercial activities on Hisingen are limited to some central squares, a consequence of the functionalistic period and the Million Programme (Miljonprogrammet in Swedish) of the 1960s and 70s, when Gothenburg developed towards a commuter town.

This is even more visible in regard to the locations of cultural activities. The city centre offers a high variety of museums, theatres, cinemas or art galleries, but also cafés and restaurants, clubs and bars. On Hisingen, those locations can rarely be found.

Flunsåsparken, an open air stage, and Backa Theatern in Lindholmen are the exceptions. The cultural facilities are mainly limited to small public libraries.

The amount of places of leisure activities, in particular sport activities as an example, is more balanced. This is true at least for sports fields and swimming baths.

The density of gyms on Hisingen for working out is much higher in newly developed areas close to the riverbank while for example in Biskopsgården no such facilities can be found.

Ringön, with its central location and good accessibility as well as the many possibilities for integrating new functions and uses into the existing buildings, is predestinated to function as a ‘melting pot’ for various commercial, cultural and leisure facilities and activities, especially for the people living on Hisingen.

This map illustrates how commercial, leisure and cultural activities are spread over Gothenburg in relation to the centre of Ringön.
FIRST IMPRESSIONS

The first impression I get on my first visit in Ringön is that against by expectations Ringön is a bustling but also place area. Once one has left the busy main street Ringögatan it becomes quite cozy and one can feel the atmosphere of an old harbour industry area. This is even more noticeable close to the waterfront where and here the water becomes visible, naturally unfolding its calming effect. Most of Ringön buildings were built from the 1950s to the 1970s and in the meantime they appear a bit shabbily but with a remarkable patina that the time and history has brought over them. The old buildings and warehouses seem to narrate the story of a time that has passed but somehow keeps lingering. It is the small details that are passing by tramp but the surrounding situation makes it hard to orientate and find the right way leading to this entrance. Coming from the city on the right side of the bridge it is still quite easy as the cycle lane just leads to it but coming from the north one may be confronted with some problems finding the foot-ways and cycle lanes at the traffic junction Brantingsmotet (fig. 38). Furthermore is the junction north of Ringögatan all come to a dead end while the southern crossroads are connected. The spaces between the buildings form interesting court yards that could be activated and made accessible for the public.

STREET PATTERN

MAIN STREET RINGÖGATAN

Ringögatan was one of the first streets that have been built in Ringön and it is generously dimensioned (fig. 40). There is quite a lot of traffic and sometimes it is hard to cross the street because of the lack of marked crossings or traffic lights. The more one gets into the area the less traffic is found. There is also a risk for pedestrians and cyclists not to be seen due to a lot of freight traffic, and trucks. Although there is a lot of space on the road cyclists and pedestrians have to share the same lane on the pavement.

RINGÖGATAN divides Ringön in a northern and a southern part. Many shops, restaurants and offices are located along Ringögatan which also makes it the main commercial street for customers.

CROSSROADS

The situation at the eastern entrance is clearer but to reach this entrance one (coming from the north- west) has to go further out east to the traffic junction Tingstadsmotet in order to cross the E6 and then take a long drive along Salinsvägen. Unfortunately there is no public ferry connection (yet) with the Alvsöbron even so there is an existing landing stage.

ACCESSIBILITY

A first obstacle one has to break through by trying to reach Ringön is that of a fairly bad connection especially for cyclists and pedestrians to reach the area (marked red in fig. 38). Although Ringön has a quite central position there are only two entrances to the area. One is on the west side and clearly visible. The small detail of not crossing it passing by tram but the surrounding situation makes it hard to orientate and find the right way leading to this entrance. Coming from the city on the right side of the bridge it is still quite easy as the cycle lane just leads to it but coming from the north one may be confronted with some problems finding the foot-ways and cycle lanes at the traffic junction Brantingsmotet (fig. 38). Furthermore is the junction north of Ringögatan quite unclear and disturbing (fig. 29).

The situation at the eastern entrance is clearer but to reach this entrance one (coming from the north- west) has to go further out east to the traffic junction Tingstadsmotet in order to cross the E6 and then take a long drive along Salinsvägen. Unfortunately there is no public ferry connection (yet) with the Alvsöbron even so there is an existing landing stage.

Unfortunately there is no public ferry connection (yet) with the Alvsöbron even so there is an existing landing stage.

WATERFRONT

Ringön is directly connected to the river Göta Å, but as most of the riverbank is used as quays belonging to the companies, properties, the water front is largely inaccessible for the public (fig.64).

There are four water basins within the area. The first one, close to Götaälvbron, is rarely in use while the other three basins function as small harbour installations. The two basins in the middle (in small areas) are used for small ‘parks’ with wooden boats. These are mainly the places where access to the water is possible and in the evening people come here to fish (fig. 56). Some are used as parking places or for the production of cement.

The spaces between the buildings form interesting court yards that could be activated and made accessible for the public.

GREEN SPACE

Green space is absolutely rare in Ringön (see fig. 48). Some very old trees line Ringögatan and Järnmalmsgatan and a few small grass stripes or stripes with bushes can be found along these two streets. More grassland can be found along the former railway in the northeast of Ringön. However, the majority of Ringön appears as a huge carpet of asphalt.
financial services, management), rental and leasing companies, maritime services (harbour, building, repairing and stalling boats), waste management and recycling companies, and others.

Some companies and businesses might be problematic for a future development due to high traffic and dangerous goods. Other companies are dealing with hazardous goods which are also problematic because of legal obligations for this purpose. This applies in particular to the integration of residential buildings where certain and higher safety regulations apply.

The following economical facts (estimated) are a provisional overview (fig. 48 Riverbank, fig. 49 Gotenius Varv, fig. 50 Leisure boats, fig. 51 Restaurant Röggön, fig. 52 Smyrna Second Hand, fig. 53 Residential Boat, fig. 55 The Tunnel).

**Timber:**
- **Göteborg Abbey:** 800,000 SEK
- **Total employees:** 3,600
- **Property owners:** 90

**Estimates:**
- **Total turnover per year (omzet):** 4,000,000,000 SEK
- **Total market value:** 6,000,000,000 SEK
- **Total technical value:** 4,000,000,000 SEK

**Maritime Services**

Within Ringön and along its riverbank many companies are located that are related to maritime services. The spectrum ranges from the shipyard Gotenius Varv, the rental company for private sailing and motor boats, Yachtcharter Göteborg AB, the trading company of traditional materials and products to procure and maintain buildings and boats, Classrooms Träfärjan AB, to the boat service company BlueMarine with own berths on the Göta Älv and many others.

**Gotenius Varv**

Gotenius Varv is probably the oldest and most visible maritime company in Ringön and the last remaining specialised company in repairing museum ships, coasters and ships for special purposes. Soon it might be the last active shipping yard in the port of Göteborg with two floating docks and a slipway. According to Mats Gotenius (study visit, 15-09-11) the shipyard Gotenius Varv is probably the oldest and most visible maritime company in Ringön. It is the biggest and most important client. Lately it specialised in repairing museum ships, coasters and motor boats. Gotenius Varv is probably the oldest and most visible maritime company in Ringön and the last remaining specialized company in repairing museum ships, coasters and ships for special purposes. Soon it might be the last active shipping yard in the port of Göteborg with two floating docks and a slipway. According to Mats Gotenius (study visit, 15-09-11) the biggest and most important client. Lately it specialised in repairing museum ships, coasters and motor boats. The shipyard has specialised in repairing museum ships, coasters and ships for special purposes. Soon it might be the last active shipping yard in the port of Göteborg with two floating docks and a slipway. According to Mats Gotenius (study visit, 15-09-11) the biggest and most important client. Lately it specialised in repairing museum ships, coasters and motor boats.

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**Social and Public Places**

**Social Services and Commodities**

Social services in the context of this investigation are meant to be places or facilities where people meet and socialize respectively facilities with a social orientation.

The restaurants (fig. 51) in Ringön are important places for workers, employees or suppliers to socialise with each other. There are five restaurants, one-kiosk and a confiseriewy on the area. Their opening hours are plenty much adjusted to the business hours of the area, mainly for breakfast and lunch. They open up between 6am and 8am and close between 2.30pm and 6pm. Over the weekend all restaurants are closed.

**Fenced Space**

In Ringön almost every property is fenced (fig. 56). As visualised in fig. 57 (ACCESSABILITY & INACCESSIBILITY) this fenced spaces represent about 80-90% of the area of Ringön. These fences can be termed as antisocial commodities with a strong connotation of segregation and exclusion.

**In 1985 the current zoning plan (detaljplan) for Ringön was decided (Melander et al. 2002). With the detailing of the contracting parties.**

**Current Detaljplan for Ringön**

In 1985 the current zoning plan (detaljplan) for Ringön was decided (Melander et al. 2002). With the detailing of the contracting parties. It is an important adjustment but to enable legal contracts between, for example, the building owners and tenants with alternative business portfolios it is necessary to ensure legal obligations and securities for both the immediate and distant future between the contracting parties.

**Purpose of Harbour**

In order to prepare an amendment due to the possible uses of the area it is essential to change the zoning plan within a narrow time frame or at least regulate a legal transition period. Currently many other uses of the area are tolerated by the municipality. This is an important adjustment but to enable legal contracts between, for example, the building owners and tenants with alternative business portfolios it is necessary to ensure legal obligations and securities for both the immediate and distant future between the contracting parties.

**Figures 48 Riverbank, 49 Gotenius Varv, 50 Leisure Boats, 51 Restaurant Röggön, 52 Smyrna Second Hand, 53 Residential Boat, 54 Fenced Space, 55 The Tunnel, 56 Fenced Space, 57 Accessibility & Inaccessibility.**

In 1985 the current zoning plan (detaljplan) for Ringön was decided (Melander et al. 2002). With the detailing of the contracting parties. It is an important adjustment but to enable legal contracts between, for example, the building owners and tenants with alternative business portfolios it is necessary to ensure legal obligations and securities for both the immediate and distant future between the contracting parties.
LEASEHOLD AND PRIVATE PROPERTIES

With the exception of a few private properties, the territory of Ringön is owned by the municipality and therefore public ownership. Properties that are not used by the municipality itself are divided in smaller plots whereby its use is regulated by long-term lease agreements. The buildings on the specific plots on the other hand are primarily owned by the leaseholders. Some of the buildings or parts of them are again rented out to third parties. This coexistence with different ownerships and responsibilities as well as the large number of negotiating partners with various interests being involved implies a great challenge for the future development especially with regard to changes.

In fig. 58, PRIVATE PROPERTY & LEASEHOLD, the time by when the leasehold contracts on the different properties will end is illustrated. The majority of the contracts will end in 2025. Up to date (summer 2015) there is no official decision made on what will happen after 2025 but an unofficial rumour has spread that the municipality might extend the leasehold.

The biggest advantage of the leasehold system is that the public authorities as far as possible retain control over the future development. A prolongation of the leasehold contracts can be articulated to requirements and obligations that are in line with the development objectives. The difficulty will be to find a broad and acceptable consensus between the negotiating partners.
INTERVIEWS
Målander et al. (2002, p. 35-42) have interviewed several stakeholders for their examination paper and due to the development of Ringön. In the following, the major statements of the interviews are translated and summarised.

Interview partners
(AF) Arne Forslund (Polis)
[BH] Birgitta Holmdahl (Chalmers besättningsplanering)
[BMO] Maj-Britt Olsbo (stadsplanerare)
[BHMO] Birgitta Holmdahl (Chalmers bostadsplanering)
[MB] Mårten Björk (Backa Ringöns Industri Förening)
[LJ] Lena Jacobsson (arkitekt)
[PS] Petra Sedelius (Business Region Göteborg / advisor business relocation)
[PAK] Per-Anders Käll (industriavdelningen, ordförande 1996-99)
[RR] Rikard Röhme (BRIF / nuvarande ordförande)
[UM] Ulf Moback (landskapsarchitekt / ÖP99)
[RS] Roger Strömberg (Business Region Göteborg / advisor business relocation)
[GJ] Göran Johansson (kommunstyrelsens ordförande)
[AF] Arne Forslund (Polis)
[LJ] Lena Jacobsson (arkitekt)
[PS] Petra Sedelius (Business Region Göteborg / advisor business relocation)

POSITIVE
- ÖP99: half of Ringön is marked as "knutad stadsbyggnadsområde" (LJ)
- municipality may proceed with expropriation if there is a public benefit (LJ)
- water level and mud is no obstacle for residential buildings (UM)
- Decrease of crime in Ringön by building residential housing and offices (UM)
- Ringön functions as a nucleus for businesses (BH)
- crimes not higher than in other industrial areas (AF)
- residential housing is an option (LJ)
- locate residential housing and restaurants which would create a nice atmosphere and surrounding (BR)
- build cheap housing to keep the prices and standard low as well as the traffic density (BH)
- leasehold provides strong security of property (besittningskydd) (LJ)
- central location, great potential (JJ/PS/PS/FaBo)
- well developed communications (JJ/RS/PS)
- Ringön functions as a "livstur för företag" (JJ/MB)
- a mixed city on a long term view means residential housing, jobs, service, trade, etc. (PAK)
- reasons for locating in Ringön: owners already live on Ringön, no traffic problem crossing the river (BR)
- the closeness to the river for marine business (RR)
- great potential in the area (RS / PS)

NEGATIVE
- problem is "omtvätt" and the long periods (LJ)
- many small private businesses, difficult for the municipality to negotiate, (LJ)
- contaminated soil (LJ/UM)
- businesses want to see a refurbishment of the area (BMO)
- residential housing and offices might rise the prices, nucleus for businesses will vanish (UM/MB/BH)
- Ringön is kind of dead after 18:00 (UM)
- disadvantage of not looking very representative (JJ/PS/PS)
- the area appears a little bit boring and shabby, derelict properties and ruined buildings (BR/PS/PS)
- demand for cheap and derelict premises which might cause a delay in Ringöns’ renewal (PS/RS)

NEUTRAL
- to build residential housing certain requirements concerning the environment must be met (BH)
- first a geological examination has to be done, need of sanitation has to be mapped (BH)
- other projects have priority (Eriksberg, Lindholmen, Fribmanuel, (JJ)
- no bigger plans are made to Ringön, no new detaljplan so far (PAK)
- other projects have priority (Eriksberg, Lindholmen, Fribmanuel, (JJ)
- it is more positive with offices rather than with residential housing so that other branches or old companies can stay (MB)
- municipality (kommunledning) and fastighetsbolag are important actors (same people sitting in both lead-
ingen positions) (MB)
- it can be detrimental only concentrating on the "new economy" because Göteborg loses many companies (MB)

SWOT-ANALYSE
- OPPORTUNITIES
  - Property owners willing to invest
  - Transformation of roofed space
  - Increase of density is possible
  - Small scaled outdoor places
  - Flexible space
  - Open ground plans
  - Compartmentalized structure
  - Existing social network

- STRENGTH
  - Strong identity as industrial district
  - Part of the riverside
  - Closeness to inner city
  - Connectivity to public transport
  - Building stock with cultural heritage
  - Mixed building stock
  - Spacious storage buildings and warehouses
  - Diversity of businesses
  - Employment
  - Existing social network
  - Public landowner (municipality of Gothenburg)

- WEAKNESS
  - Great potential in the area (RS / PS)
  - Transformation of roofed space
  - Increase of density is possible
  - Small scaled outdoor places
  - Flexible space
  - Open ground plans
  - Compartmentalized structure

- THREADS
  - Pollution
  - Rising flood waters
  - Leasehold, many negotiating parties
  - High renovation costs
  - Security regulations due to public safety
  - Geological situation
  - Centrification, rising prices
  - National interests due to transport routes
  - Lobbying and capitalist interests

- OPPORTUNITIES
  - Compartmentalized structure
  - Open ground plans
  - Flexible space
  - Small scaled outdoor places
  - Increase of density is possible
  - Transformation of roofed space
  - Property owners willing to invest

36
A significant part in the strategy of this thesis is the preservation of pre-existing elements. The idea is to develop Ringön from the inside using the existing stock as basis for the future development.

BUILDING STOCK & HISTORICAL HERITAGE

It is obvious that not every building in Ringön is worthy of preservation. It depends on many factors like the substantial condition, consensuality of the construction ground, capabilities for preservation and conversion or possible pollutants and so forth, and must be decided individually in any case a prior and careful examination and situational analysis has to be done. Whether a building can be seen as historically valuable or not should in detail be discussed by a group of experts of the different disciplines together with the building owners. Once a building is worthy of protection it should be painstakingly and thoroughly restored and refurbished and where necessary be modernised.

 Especially the first-generation buildings are characteristic for Ringön and its unique identity. New functions and the opening to the public can arouse the buildings from their slumber. These buildings are significant landmarks for the area and could serve as basis for the future development.

COMMERCIAL FACILITIES

Along Ringögatan, a great variety of retail companies and services are located. This structure should be preserved in order to develop Ringögatan towards a diverse and attractive commercial street. The point of departure is to intensify trading on Ringögatan by attracting more and different shopkeepers and, as a result of this, to attract more and various customers and clients.

Long-term aims are higher fiscal revenue for the city, higher turnovers and sales for businesses, creation of employment, optimising the commercial use and the increase of attractiveness and stimulation of the street level.

A first step could be to evaluate empty properties and properties with aptitude for retail activity and develop a concept making those spaces available for concept stores like e.g. guerrilla stores or pop-up stores. Those kinds of stores are often run by young and creative entrepreneurs or start-ups with very specific target groups and customers. As a result of this the variety of shops and the number of different customers would increase. A combination of existing companies with the new shops is also conceivable.

A strong concept and available spaces can get msec into motion. The first phase could be temporarily limited in order to evaluate the outcomes. This phase is not necessarily combined with big investments but it will lead to win-win situations for landlords, who will have a good occupation rate of their properties, business constructors who find space at the beginning with lower rents to start and established companies who might extend their client base. A diverse economic foundation is also more sustainable and resilient. After a successful initial phase a concept for establishing permanent uses can follow. In case of a negative outcome the concept can be changed or rejected.

The long-term strategy should seek to create a dense, diverse and cohesive structure of small-scale shops by promoting the rehabilitation of the building stock and closing the unattractive gaps between the existing buildings on vacant plots.

SOCIAL FACILITIES

The elements of social facilities are another important issue for the future development. Those facilities are rare but still are relevant for socialising and meeting of people. In order to create a socially sustainable district it is necessary to establish personal and social space that is available for different cultural and ethnic individuals, groups and organisations. An appropriate balance between commercial use, business benefits and social and cultural encounters guarantees a fair and urban communal life open for everybody to participate.
DEVELOPMENT

 Apart from the preservation of important parts of the existing stock, the advancement and transformation of pre-existing structures is a central point of the strategy. Here the emphasis is put on the infrastructure and how it can be developed to create new spaces and places.

CURRENT ROAD SYSTEM

The current road system is splendidly constructed and generously dimensioned. It ensures a good traffic connection of the particular properties. However, the roads are primarily built for vehicular traffic and pedestrians and cyclist only play a secondary role. In reference to an environmentally compatible future development, the existing road system needs to be converted into a reduced-traffic area with emphasis on pedestrians, cyclists and greenery. By narrowing the wide roads, plenty of space can be generated. The design of the streets should expand the public space and serve as meeting places instead of pure service roads. As a result of this, exhaust pollution as well as traffic noise can be reduced and traffic safety increased.

The specific and concrete measurements to improve the traffic situation should be incorporated at an early stage of the planning so that further developments can be adjusted to them.

The relocation of the main road to the northern edge of Ringön (tied in fig.64), which could be realised in connection with the construction work of the new tram line Frihamnen it is easy to reach and a central location between Ringögatan and Järnmalmsgatan as well as its closeness to the tram station Frihamnen it is easy to reach and a central point for urban pathways. The idea here is to create a traditional city square for Ringön inviting people to meet and linger. A point of departure could be to organize a weekly market with specialties of local and regional farmers.

The disposal of the existing buildings with its intermediate spaces and court yards allows cross-connections within the buildings along the new pathways get connected to the public road network.

SQUARES AND PLACES

An important part of urban neighbourhoods is the integration of open areas such as public squares serving as meeting places and centres for encounter and where activities of various kinds are possible. Within Ringön there are five larger appropriate open spaces that could be turned into such public squares as marked in fig. 63.

The space called District Square is currently an open space used by the municipality as car pool. Because of its central location between Ringögatan and Järnmalmsgatan as well as its closeness to the tram station Frihamnen it is easy to reach and a central point for urban pathways. The idea here is to create a traditional city square for Ringön inviting people to meet and linger. A point of departure could be to organize a weekly market with specialties of local and regional farmers.

The open space marked as Harbour Square is also used by the municipality as a material pile. The location with access to the riverbank and a beautiful view over the river could be transformed into a square with maritime atmosphere with a strategic focus on tourist preferences in connection with a new pier station, a sloomboat terminal and a “Harbour City District”.

The space for the Art Square emerged through an accidently fire on December, 1st in 2014 that raised an entire warehouse to the ground. This location with access to one of the water basins next to Ringöns’ art gallery could be turned into a square or park for outdoor cultural and leisure activities. Providing walls for street art painting, pedestals for sculptures, stages for performances, and similar more, the square can become a central place for collaborative exhibitions and shows in public spaces functioning as an interface between arts and urban commons.

The grounds of the cement company in the northern part could be transformed into an Open Air Event Arena for open air concerts, film screenings and similar events. The peripheral location is close to the highway allowing a higher level of noise (sound) for the duration of the events.

Last but not least is there the Sport Arena located in the East of Ringön, also close to the water, which is ideally suited for an outdoor sport and leisure centre. Activities could take place on the land as well as on the water. Here the river gets wider and the distance to the far is increased. This means ideal conditions to set up water sports associations like rowing or sailing clubs. Furthermore, fields for beach volleyball or a skate park could be developed.

RIVERBANK PROMENADE

Making the riverfront available for the public is a crucial point in the development of Ringön because of its attractiveness and possibilities for leisure activities. A riverside promenade enables public access to the water and could be designed as a structural fixed leisure area combining hard and soft surfaces, pathways and greenery. There should be a fair balance between public and commercial uses as well as public and private control so both sides can benefit.

NEW FUNCTIONS IN BUILDINGS

In order to develop a lively and versatile district it is important to increase offerings for public uses. This applies as much to the public space as to the use of the existing buildings. Many buildings are ideally suited for alterations and conversion with the advantage of not having to be rebuilt. Necessary investments are limited to renovation and sanitation and a temporary use will show whether further investments are worthwhile in order to establish a permanent use.
Some of the narrow spaces between the buildings in Ringön could be turned into lively, cosy streets with cafés, bars and shops. This concept turned the Old Truman Brewery in London into a popular meeting place for young people, especially on week-end evenings.

Since the 1970s, the Arena in Vienna developed out of an area used as a slaughterhouse and is today a centre for alternative culture. In addition, it is also a location for music events. During the summer it is used as an open-air cinema. The Arena is managed by an association on an autonomous and direct democratic basis.

The comparison of the IL Recycling hall and a tennis hall in Switzerland shows, that it is not a question of the construction. It is a question of use. Take the paper out, put some sand in… Advantage - Ringön.

The square called Yppenplatz is one of the liveliest squares in Vienna. During the last ten years it developed into a multicultural square with a farmers market, various street cafés, restaurants and delicatessens in small pavilions. Many artists and other creative have settled around the square and its neighbourhood. The Yppenplatz is also a location for many public events.

The comparison of the IL Recycling hall and a tennis hall in Switzerland shows, that it is not a question of the construction. It is a question of use. Take the paper out, put some sand in… Advantage - Ringön.
The general proposition of this thesis is to implement view projects that could function as catalysts for the development of the area.

The municipality of Gothenburg has already shown the effectiveness of such catalyst projects in Frihamnen. The establishment of a roller-skating rink, urban farming boxes, a water artwork as playground, the public sauna “Svettekörka” and the outdoor pool “Pöl Harbour” has attracted many people of all ages and has become a great success activating the area and finding out peoples’ desires due to the future developments of the new park Jubileumsparken.

New elements, particularly with regard to architectural elements, can temporarily be implemented in order to fill existing gaps or to supplement existing structures and to set off a desired development. In some cases, this could simply be street furniture like benches, in other cases small temporary buildings need to be placed enhancing to determine the efficiency of the implemented measures and to prove, if the design works in its entirety. In a second step and once a measure has turned out to function, the structures and elements can be rebuilt and become a permanent component of the development.

**DISTRICT SQUARE**

The proposed district square should be complemented and surrounded by small pavilions hosting market stalls, small shops, boutiques, cafés and restaurants. Their disposal should reinforce the impression of the square and limit its dimension. Adjoining buildings could be further developed to extend the activities on the square, e.g. as a converted market. The idea here is aligned to the ancient Greek agora as a paradigm in the development of urban squares.

**HARBOUR CITY DISTRICT**

The establishment of a new guest harbour could go hand in hand with the creation of a Harbour City District in Ringön with a directive focus on tourism as well as the concentration of maritime services and trade. The presently undeveloped area offers a unique opportunity to create small-scale but coherent architectural structures hosting, for example, a maritime museum in combination with a museum for industrial history, hotels and boatels (hotel on the water), shops with spare parts and accessories for boats, seafood restaurants, and so forth. The square itself could be designed in a way that it could be used as winter storage for leisure boats.

**STEAMBOAT TERMINAL**

A steamboat terminal could be the central landing stage for excursion boats to the archipelago as well as to the lake Vänern and the canals to Stockholm. Furthermore, it could become the home port for museum boats like Ångaren Bohuslan and Färjan 4. A small boat rental can complement leisure activities on the river. Last but not least provides the terminal the opportunity to extend the ferry line Alsnabben having a landing stage there.

**OPEN-AIR EVENT ARENA**

The area around the cement plant in the north could be the place for various open-air events like music festivals, concerts, theatre performances and cinema shows. Several smaller and larger stages as well as a movie screen could be implemented. The cement plant itself could be converted for bars, restaurants, nightclubs, smaller indoor stages and rehearsal rooms. This would also preserve the plant as a landmark. The area should be surrounded by smaller buildings or pavilions in order to define it towards the outside and additionally being able to control the attendance for safety reasons. Those buildings could host rehearsal rooms, a music and acting school, a youth centre or the like, activating the area during weekdays.

**SPORT CENTRE**

Many sports are bound to sports fields or in case of aquatics to the water. Around sport fields and along a possible rowing track, stands for spectators could be constructed in order to watch sport events or competitions. Other possibilities using the area could be a beach amusement park, a surfing school or a waterskiing centre with a lift system. The existing building, currently used as cold storage, could be converted into an indoor sports hall.

**ART CENTRE**

Last but not least it is the artists who are often responsible for initiating a significant change. Ringön offers various opportunities for the needs of artists. Järnhallen has already taken this step and cautiously spreads out its wings over Ringön. This is the starting point of the next chapter SYNERGY focusing on the spot and developing a design for it.
From RIVERSIDE to WATER STAGE
The lake stage on the Lake Constance is the venue for the famous Bregenzer Festspiele (Bregenz Festival) attracting many visitors and tourists from all over the world. Göta Älv still offers some unspoilt places along the riverbank and on the river itself that could be developed for cultural events in front of a spectacular scenery with an impressive atmosphere.

From OPEN SPACE to SAND BEACH
A simple backfill with sand, an improvised bar, two turntables and some sun loungers turned an unused place at the Donaukanal (Danube Canal) in Vienna into an urban chill-out and party beach, the Herman Strand (Herman beach).

From SWIMMING BARGES to BATHING SHIP
Vienna already had it for several years, and Gothenburg has it since summer 2015. A swimming pool on the water. Vienna’s Badeschiff combines two boats, including a pool, a sun deck, a restaurant and a club-discotheque below deck.

From YARD to CITY FURNITURED
Often it is enough to implement small things to activate a certain place and attract people. The courtyard of the Museumsquartier in Vienna is furnished with creative street furniture called Enzi. It is a favourite meeting place for people of all kinds, origin and ages.
BACKGROUND

Goite accidentally saw an announcement in the local newspaper Göteborgs-Posten with the information that one can apply for an exhibition at the “Konsthall Älvstaden” (art gallery in Älvstaden) for an exhibition called Hall of Fame. As I haven't heard about this gallery nor seen it on the internet before, I decided to attend the workshop “Kulturens plats i Älvstaden” (the concept of the “Hall of Fame” – art laboratory festival) to learn more about the process of creating art within the context of Älvstaden.

The festival finished with a following exhibition. The festival was sponsored by Göteborgs Stad. Fastighetskontoret of Ringön Fastighetsägarförening, Ringö Brygga, Ringökajen Fastigheter, Lundby Plåt, Stavdal, IL Recycling and Visions Gruppen. The festival has lasted 4 weeks and various national and international artists created different art pieces demonstrating their process over time inside and outside of Järnhallen. The festival finished with a following exhibition. After the workshop I had an interesting talk with Anna Bergman exchanging some thoughts about the development of Ringön and in the end she invited me to take part in the festival Hall of Fame – Art Laboration in May 2015.

Anna Bergman is an artist and the founder of the art gallery Järnhallen that she established just a few weeks before. She started her atelier in an old warehouse from the 1960s at Järnmalmsgatan, has already shown that small changing and renovation can cause great effects and bring a process into motion without the need of big investments. During the discussions and conversations with the artists and other interested visitors it came out that there is a great demand for available space.

As a participant of the Hall of Fame and the vision to spread art over the area of Ringön the question was followed how architecture create new spaces within the existing halls of Ringön. The sponsoring by the Fastighetskontoret of Ringön Fastighetsägarförening, Ringö Brygga, Ringökajen Fastigheter, Lundby Plåt, Stavdal, IL Recycling and Visions Gruppen.

The project is about to show how new spaces can be created within the existing buildings around the festival area by implementing basic architectural elements without changing the existing building structure. The design is easily feasible and could be realised straight away. The background of an art exhibition is taken as an occasion to show that architectural elements are not only constructing elements but correlating with each other and our perception. In order to showcase these ideas, ten examples for the design of Järnhallen, located on the second floor of a warehouse from the 1960s at Järnmalmsgatan, have already shown that small changing and renovation can cause great effects and bring a process into motion without the need of big investments. During the discussions and conversations with the artists and other interested visitors it came out that there is a great demand for available space.

The idea for the project is to show how new spaces can be created within the existing buildings around the festival area by implementing basic architectural elements without changing the existing building structure. The design is easily feasible and could be realised straight away. The background of an art exhibition is taken as an occasion to show that architectural elements are not only constructing elements but correlating with each other and our perception. In order to showcase these ideas, ten examples for the design of Järnhallen, located on the second floor of a warehouse from the 1960s at Järnmalmsgatan, have already shown that small changing and renovation can cause great effects and bring a process into motion without the need of big investments. During the discussions and conversations with the artists and other interested visitors it came out that there is a great demand for available space.

A straight line is the simplest linear element. It is a wall and a minimum of three not linear orientated elements denote terms like origin, centre, concentration of those elements and the correlation between them defines space and makes it perceptible to the senses. Depending on direction, orientation, size, geometrical forms, colour or surface structures, the elements themselves appear in different appearances. The given project determines a landscape of basic elements (Arnheim 2000). According to Kandinsky (1973) the effect of dynamics is a result of the inherent tensions of the elements and objects. A point is the simplest selective element. Selective elements define areas in horizontal or vertical directions. A combination of those elements and the correlation between them defines space and makes it perceptible to the senses. While a line can be stepped over, a point requires two sets of room in relation to each other and their surrounding (Ullmann 2005).

A particular investigation of some buildings has preceded the design process in order to understand the structure of those buildings and to apperate the result- ing opportunities for the design. The outcome of this investigation was then transferred into a scale model (1:200) serving as a basis for the exhibition.

Before introducing the project design in more de- tail, the examined buildings will be described first on the next pages. To keep this short, only the most important aspects are shown, but it has to be men- tioned, that the complete examination is based on the original construction plans that are available in the archive of the City Planning Authority.
This building on the eastern part of the property Tingstadsvassen 19:3 is surrounded by the streets Ringögatan, Manufacturgatan and Järnmalmsgatan. It was built in 1954 as a department store or depot. The first plans are made by Tholén & Stenberg Byggnads AB.

It consists of a larger and a smaller hall and an addition with office space. The larger hall is completely constructed as a timber skeleton while the smaller hall has steel uprights. The halls are divided through a 25cm light concrete wall. The addition is constructed as a steel skeleton, the whole building has trapezoidal sheet metal cladding.

Construction plans: Tholén & Stenberg Byggnads AB 24.11.54

This building on the western part of the property Tingstadsvassen 19:3 is surrounded by the streets Ringögatan, Kolgruvegatan and Järnmalmsgatan. It was built in 1954 as a warehouse with rail connection as well as loading ramps for trucks.

The building has a semi-basement of concrete with two rows of 40x40cm piles and transversal concrete beams that carry the ceiling.

The first floor is constructed as a concrete skeleton with a red brick infill. The infill is partly punctuated with ribbon windows or cargo doors.

The roof is carried by 12m pre-stressed concrete beams.

Construction plans: unknown 28.10.1954
This building on the property Tingstadsvassen 18:17 is located at Manufacturgatan and Järnmalmsgatan. The warehouse and a one-story office section were built in 1952. The warehouse got an addition in 1967 in the northern backyard. The second floor of the office section was built in 1997.

The steel construction on the southern facade was used to load and unload steel beams from the cargo trains (fig. 108).

Construction plans: Byggnadstekniska Byrå 6.12.1952

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This building on the property Tingstadsvassen 18:18 is located at Manufacturgatan. It is an old garage built in 1952. A paper storage was added to the property in 1987.

The garage is a timber construction with a saddleback with a timber roof framework. It has a firewall out of light concrete. The interior wall and the southern exterior wall have an infill out of hollow cement blocks.

The paper storage is a steel skeleton construction with foamed concrete panels as infill (fig. 106).

Construction plans: LTB Bygkonsult AB 6.12.1952

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## Material Mix

<table>
<thead>
<tr>
<th>Layer</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2 lag papptäckning 2,0cm sticked 2,1cm stickad 3,0cm hyd. skina 4,5 + 2cm basaltskiva + 120 + 9,5cm mineralwoll 0,20cm plastfolie 12 + 9,5cm mineralwoll 0,20cm plastfolie 1,3cm gipsskiva 3 2cm skärv, avjämnas med makadam grundblad bxh = 25x60cm</td>
</tr>
<tr>
<td>2</td>
<td>2,5cm basaltskiva 3 2cm stickad + 120 + 9,5cm mineralwoll 0,20cm plastfolie 12 + 9,5cm mineralwoll 0,20cm plastfolie 1,3cm gipsskiva 4 2cm skärv, avjämnas med makadam grundblad bxh = 25x60cm</td>
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<td>3</td>
<td>20cm betonghålsten 4,5cm stålreglar 4,5cm mineralwoll 0,20cm plastfolie 1,3cm gipsskiva 4 2cm skärv, avjämnas med makadam grundblad bxh = 25x60cm</td>
</tr>
<tr>
<td>4</td>
<td>2,2cm golvspänskive 45-100cm råls upplag för golv papp 45x145cm reglar 1,8-7,0cm gles panel c 400 1,3cm gipsskiva 6 28x70cm spikläkt c 600, snedsägas 50 M upplag för golv papp 45x145cm reglar 1,8-7,0cm gles panel c 400 1,3cm gipsskiva 4 2cm skärv, avjämnas med makadam grundblad bxh = 25x60cm</td>
</tr>
<tr>
<td>5</td>
<td>25cm lättbetong 18cm betong 10cm mineralwoll 15cm betong 8 Mineralwoll</td>
</tr>
</tbody>
</table>
This building on the property Tingstadsvassen 18:16 is located at Järnmalmsgatan next to the water basin. The department store was built in 1960. The entire building is constructed out of wood and consists of two floors.

The whole building has trapezoidal sheet metal cladding.

Construction plans: A.-B. Skanska Cementgjuteriet Göteborg 22.11.60

This building on the property Tingstadsvassen 18:16 is located at Järnmalmsgatan and Kaddisbruksgatan. The office building, combined with a warehouse, was built in 1960.

The roof of the warehouse consists of space frame trusses loaded on precast concrete pillars with an infill of light concrete.

The office building has walls of light concrete blocks on the ground floor while the first floor is a wood construction. It has a saddleback with a timber roof framework.

Construction plans: Aktiebolaget Göteborgs Industribyggande GIB Gustaf Sandén 30.11.1960
The imagination on how in the past trucks approached the building getting loaded and unloaded led to the idea of re-interpretating the movements of the goods that have been stored in the warehouse. The moveable wagons are a quote to this procedure and the former use of the building.

The basic principle of the wagons is borrowed from the stage design. A basic wheeled and walkable frame out of wood or steel that is planked with walls having openings where they are needed or wanted (fig. 128). The wagons are embedded into a raised floor and can be moved with the help of counterweights similar to the principle of an elevator, but in horizontal direction.

The symmetry of the building with opposite cargo doors in the exterior walls and the unsupported roof allows arranging three wagons in a row (fig. 127). The traversed hall has a width of 12m which makes each wagon 4m long. The cross section of a wagon has the measures of the cargo doors with 2.4m in width and 2.8m in height. The outer wagons of the rows can move left and right, out of the building or into it, while the central wagon of the row can also turn round as illustrated in fig. 127.

This system leads to a huge variety of possible constellations generating different spaces inside and outside the building (fig. 124-126).

Walls are a combination of linear and vertical lines dividing and creating space. The idea is to place them with open room corners to create a floating space with open views from central points providing a good overview of several rooms. The diagonal lines of sight increase the dynamic appeal.

The depth of the rooms in this constellation gets maximised and allows an open communication between them. Furthermore, this arrangement causes rooms of varying openness or closeness suitable for different uses. The centre corridor links all rooms as the service axis and houses also the staircases to the cellar (fig. 130-136).

The inner right angle provides two opposite perceptions towards the movement. In the longitudinal direction, one is guided in parallel and along the building but at the same time moves against the transverse standing building part appearing as an obstacle. In order to offer a choice on how one continues its way two open passages through the L-shaped warehouse along the axes of the court yard can be created connecting the yard with the surrounding streets (fig. 131). This has also the effect that one passing the building, all of a sudden finds oneself in a completely different environment even with a view to the water basins.

The wagon construction allows arranging three wagons in a row (fig. 127). This system leads to a huge variety of possible constellations generating different spaces inside and outside the building (fig. 124-126).

The cargo doors themselves can be preserved as shutters.

Hans Hollein has used this concept in a much larger scale for the design of the exhibition rooms at the museum Abteiberg in Mönchengladbach, Germany (fig. 133; Museum Abteiberg, website).

The court yard

The L-shaped court yard between the two buildings on the property Tingstadsvassen 19:3 continues on the property Tingstadsvassen 18:16 connecting Ringögatan and Järnmalmsgatan. Those two court yards are outstanding suitable for a pedestrian zone offering new and surprising views due to their frequent changes of direction.

The original openings on the outer facades for the cargo doors can be converted into windows or terrace doors. The cargo doors themselves can be preserved as shutters.

The court yard and invite to sit and meet.
DEFINING SPACE THROUGH A PAINTED FLOOR

A painted floor (plain element) respectively a different floor material of a limited extension already defines a certain space (fig. 137). Here this space is supported by three open ring elements above to extend the space in the vertical direction. (fig. 135+136).

The cantilever of the middle ring element creates an additional recognizable space besides emphasizing the overhead space and projecting it to the ground. This element is carried by a row of round columns limiting the space to the side but allowing a gentle flow around as the columns are round.

3 PLAIN ELEMENTS

Round selective elements are undirected having a neutral and equal impact on their surrounding as shown in fig. 138. Lined up in a row, the columns suggest a wall and spatial limitation but offer very little resistance to the surrounding space allowing circulation which in turn reunites the space in our perception. The row of columns functions as an undirected filter.

GENERATING SPACE THROUGH AN ELEVATED FLOOR AND A CEILING

Another possibility of creating space with plain elements is the correlation between a given base area and a corresponding ceiling. The distance between those two horizontal surfaces determines the density of the space and how we perceive it. The smaller the distance, the higher the density of the space and the higher the intensity as we perceive it.

This principle is the idea of the implemented pavilion. The perception of this space differs fundamentally from the perception of the space of the hall. By this, the pavilion is experienced as an autonomous space element. This impression gets strengthened by the elevation of the base area and the wall at the end defining the expansion in the longitudinal direction.

The columns “lifting up” the ceiling mark an additional space. Here, the space moulding and space supporting attributes are combined.

GENERATING SPACE THROUGH LOWERING THE FLOOR

A third possibility of defining space is to lower the ground. As it is not possible in this case, the idea is to use the height of the building and make the space accessible only from above which has the same effect.
The four different designed entrances into the building all lead to the atrium. The pathways are designed with a different surface material as shown in the ground plan (fig. 122). As the shifted axes do not meet in a single point, a dynamic flow around the atrium is created (fig. 144). This effect is intensified through the inclined position within the hall.

As the atrium is opened at the top, it connects the inside with the outside and provides an outdoor space within the hall.

The atrium is meant to be built out of old patio doors and windows (fig. 147).

Entrance Qualities

The idea of the entrances to the room around the atrium is to thematise different qualities of transitions.

The south entrance (A) is a simple and barrier-free opening.

The opening to the east (B) is the horizontal connection to the outside created as a penetration of the facade.

The west entrance (C) from an elevated corridor symbolises the crossing of a threshold (joist). This “stepping over” or “stepping in” features the special character of the room that is entered.

The north entrance (D) is designed as a gate to symbolise the “stepping through” and to emphasise the spatial change.

Walls have different effects due to their texture or consistency. A common wall is mainly a closed and physically impermeable boundary. This space deals with perforation and interruption of the walls.

The longitudinal walls, designed out of deep vertical wooden slats, convey a spatial boundary through a physically permeable wall but interfering with the space around. Only the view from the side gives an impression of a closed wall. By eliminating the inter-spaces between the lamellas, the transverse walls appear as interrupted closed walls.

Angular columns or pillars are in contrast to round columns directional.

The pillars of the inner wall of this room have an expansion in the longitudinal direction guiding into the hall. The cantilever at the end reaches into the room around the atrium creating a spatial connection to it. The pillars in the facade are orientated transverse, emphasising the relation to the outside street level.

DIFFERENT QUALITIES OF THE WALL STRUCTURE

Walls have different effects due to their texture or consistency. A common wall is mainly a closed and physically impermeable boundary. This space deals with perforation and interruption of the walls.

7

8

WALL WITH BREAK THROUGHS

Angular columns or pillars are in contrast to round columns directional.

The pillars of the inner wall of this room have an expansion in the longitudinal direction guiding into the hall. The cantilever at the end reaches into the room around the atrium creating a spatial connection to it. The pillars in the facade are orientated transverse, emphasising the relation to the outside street level.

The graphic illustrates the correlations between square or rectangular pillars and the energy flows (blue) or force fields (orange) appearing on them.
This design shows the influence of curved walls and the different correlations of concave and convex formed structures that lead to a variety of spatial dynamics.

The entrance is emphasised by the convex orientation and therefore has a pulling effect into the building (fig. 156+159).

The circular walls of the lounge (fig. 157) are composed as two open circles with different centroids. This creates a spatial interrelation between the elements (fig. 162). The different centres of gravity create a spatial tension with variant densities of space resulting in a dynamic space composition (fig. 162). Kandinski calls this effect a "zweiklang" (Kandinski 1973).

The organic and amorphous structure has no specific spatial orientation (fig. 158). The dynamic of the space arises from the interaction of compression and expansion as well as narrowing and enlargement. Thereby, the dynamic motion gets slowed down or speeded up which leads to exciting spatial experiences with opening and closing rooms.

There are two main ideas of this high line structure. On the one hand it is a quote to the former rail wagons operating in the area and a re-interpretation of the industrial activities in Ringön. On the other hand it emphasizes the dynamic of movements along Järnmalmsgatan.

The structure starts in the west in front of the L-building with an elevated front court signifying the main entrance to the building. Following the former rails, a number of equal elements with the proportions of a fright wagon are lined up towards the east.

Each element is provided with and accessible through a separate stairway. The stairways create a wave like structure responsible for the longitudinal dynamic impression.

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Each element is provided with and accessible through a separate stairway. The stairways create a wave like structure responsible for the longitudinal dynamic impression.

The frame constructions on the elements have two intentions. First, to express the effect of a perspective view when standing at the beginning of the structure or walking in between.

Second, the frames can be used for installations or as static pillars for additional constructions (fig. 165).

The elements are meant to be a possibility to activate the public space along Järnmalmsgatan by letting people use and organize the elements according to their own ideas (fig. 165).
An important project to gain experience and knowledge about the local conditions and the municipality. Also the association of the property owners (Fastighetsägarna i Göteborg) has recognised that Ringön is in a situation of change. Foremost Niels Nilsson, chairman of the association and property owner himself, has his own ideas and imaginations on how Ringön could develop. He names Grandville (Philadelphia, USA) and Poblenou (Barcelona, Spain) or Kreuzberg (Berlin, Deutschland) which developed mainly through the initiative of the local people into these popular and hip districts as they appear today.

There is no doubt about the fact that Ringön will develop. It is a question of how and in which time period this is expected to take place. In this thesis, it is primarily importuned to gather information and data about the legal regulations, for example the planning regulations, the zoning restrictions due to the distance to streets or the railway as transport routes for dangerous goods, the security distances that result from these, the protection preserving the industrial characteristic and historical heritage of Ringön. Some of these elements are pointed out in this thesis but of course this is based on my personal experience and has to be adapted to the actual circumstances and needs.

In parallel to this process, a more intensive and detailed investigation of the inventory should be made and explicitly mapped to be possible in the context of this thesis. In particular, the zones with necessity and risk of soil contamination in combination with the relevant objectives for a new temporary use. An important criterion is the environmental burdening of the soil. Some of the property owners have already commissioned an investigation of their grounds and have a report, but there is no official and final summary of results. As the other local actors, the property owners want to start with small projects. The association of the property owners is also in close contact with the Property Management Administration and focuses on Järntorgatan as a starting location.

Last but not least it can be reported that in the meanwhile a new “atelier house” has opened on Stenkolsgatan. mass and the city’s public life and politics. How much risk they are willing to assume themselves. It is understood that not all properties are suitable for new functions or worthy of protection. Nor will it be possible for certain businesses to remain in the area, especially those businesses that handle with dangerous goods or have high environmental emissions. In such cases the question will raise of how to proceed after the ending of the leasehold contracts. All this point, however, is stuck for an answer.

The metAMORPHosis of Ringön - it has already started...