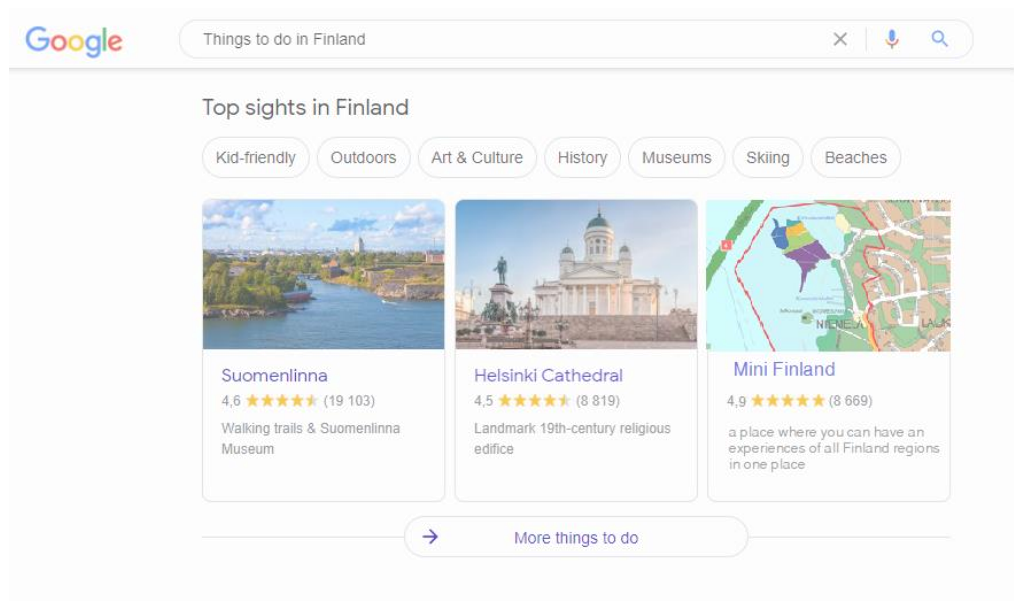


Mini Finland in Heinola

Niemelänranta development proposal



LAB University of Applied Sciences

Urban and communicative development

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1 Introduction

The focus in planning of Niemelänranta aims on matching and developing the present areas and functions in context with future development needs and suggestions. Present uses are mainly recreational, accommodation and travel. The area has also important landscape and cultural-historical values. (Kuivalainen 2022.)

The participatory master plan is partly an anticipatory tool for predesigning, specifying and complementing the local master and detailed plans. In the participatory master plan the main objectives for the planning are determining possible areas for residential building, improving recreational activities, increasing business activities and connecting the area better with the downtown. Residential building could also be floating. Important factor is the better usage of the waterfront of lake Ruotsalainen. Also improving liveliness and vitality of the area are in the development needs. (Kuivalainen 2022.)

Niemelänranta planning area is largely included in the Heinola national urban park and the management and use plan for this directs also the planning. Other guidance is derived from the city strategy and the sustainable development action plan. This action plan has several goals that touch also the planning (Heinolan kaupunki 2017, Kuivalainen 2022). These are

- improving sustainable travel and tourism and sustainable mobility
- climate change adaptation by preserving green areas and managing stormwaters
- protection of biodiversity in forests
- improving and maintaining social and cultural sustainability
- litter free city
- protection of water bodies
- resident communication and participation

The Climate Change roadmap of Päijät-Häme also defines some means for mitigation and adaptation. In this case the most important ones are the sustainable mobility, developing and maintaining ecological corridors and protecting the carbon sink effects of forests and soils by land use and sustainable forestry practices. (Päijät-Hämeen liitto 2020.)

2 Background research

2.1 Literature review

The city is continuously reshaped and rebuilt through political and administrative decisions as well as through the actions of individuals and private businesses. (Hemmersam et. Al. 2015:45.) Placemaking facilitates creative patterns of use, paying particular attention to the physical, cultural, and social identities that define a place. It highlights the fact that landscape is never ready, and it can be changed with the community-based participation. Local community is important when quality public spaces are planned. The main idea is that well planned public spaces can improve people's health, happiness, and wellbeing. (PPS 2022.)

Placemaking started to become a movement in the 1960's with the work of Jane Jacobs and William H. Whyte. The term "placemaking" was first time used in 1990's in the project for Public Spaces (PPS). Projects focus was laid on building communities and the term described their approach of building communities around a place. The purpose was to invite people to reimagine and reinvent public spaces collectively as a heart of every community. (Placemaking Europe 2022.)

In Finland the goal of the Land Use and Building Act is to ensure the conditions for a good environment and promote ecological, social and cultural sustainable development. The municipalities and the regional councils are obligated to inform residents and local stakeholders about their planning processes. All residents in the municipalities can comment on the plan proposals. The aim is to keep the planning processes transparent. The goal of the participation is to prevent conflicts, because there are always different interests involved in land using. (Lumiluoto 2018:16, Ympäristöministeriö 2007.)

The participation contains three elements: communication, dialogue and information gathering. Usually participating in the early phases is mainly information sharing and it is implemented mostly through newspaper announcements, websites and the land use planning review. Some municipalities use also direct letters to the partakers. There can also be workshops, steering groups and seminar working in some planning projects, but these were not all open to the public. (Lumiluoto 2018:20.)

The administrative process in area planning is often criticized for the slowness of the process. Often the land-use planning process contains more handling of the complaints from citizens and authorities than genuine participating of the citizens and the organizations of the planning area. (Lumiluoto 2018:1, also McGuirk 2001.)

Intangible cultural heritage and tourism

Visiting and experiencing intangible culture can be difficult to define and describe and the intangible culture is equally difficult to measure or evaluate by impacts when compared to tangible heritage with physical sites or objects. There are also knowledge gaps on how to promote and enhance tourism

based on intangible culture heritage. Tourists can lack basic knowledge of local cultural values and behavior patterns that affect both the tangible and intangible cultural heritage and this can reduce the possibilities for tourism development. (Esfehani, M. & Albrecht, J. 2019.)

Intangible Cultural Heritage can be split into five domains which are:

- traditions and expressions, including language as a vehicle of intangible cultural heritage
- performing arts
- social practices, ritual, and festive events
- knowledge and practices concerning nature and the universe
- traditional craftsmanship

Qeshm Island Global Geopark in Iran received UNESCO Global Geopark status in 2008. It has both tangible (landscape) and intangible (traditional lifestyle) cultural heritage. With these accompanied and interlinked, the complexity of planning and managing tourism is increased. Sustainable tourism development has to be in line with the needs of community and support, safeguard and respect local people and their culture. The study itself has ethnographic background and main study methods were interviews, discussions and observation. All study participants were locals with solid knowledge and personal history and connection on the location and the heritage. Most of them had also working connections with tourism planning, at least in some extent. One of the main conclusions of the study was that locality and authenticity are key factors in successful preparation of intangible cultural heritage-based tourism. (Esfehani, M. & Albrecht, J. 2019.)

Time Machine tool

The Time Machine is a participatory tool created in collaboration by STIPO and the Reinwardt Academy. It was developed for bringing the intangible heritage and urban development worlds closer together. Time Machine discusses and connects past, present and future from a specific place together with stakeholders in one visual timeline. History and stories behind places can be a source of inspiration and direction for the future development of places and areas, create possibilities for sharing intangible cultural heritage and enhance the sense of connection with the place. This can also benefit intangible culture heritage tourism and it's marketing. Another asset is that Time Machine can also prevent people's disconnection and displacement in the future. (Lindhout 2018, Veelders & Wezenberg 2019.)

The method used in Time Machine is a basic workshop. The key element of the tool is multiperspectivity with the goal to widen the narrative about the place and the history. Through this people are provided with a wider range of possibilities for relating and creating connections with the places. Different stakeholder groups and their unique observations, memories, emotions and histories with

places increase the diversity of perspectives. In Time Machine method the scope is in cultural-historical values, so it is important to pay attention on the historical timelines. Main categories for evaluation are built environment, social context, political context, economic context and reputation. The timeline forms quite naturally and effortlessly by placing categories in different time periods. The transformations and links of the place through time will become visible as the timeline takes shape. The end result of Time Machine is the “Value Passport” in which five core values for preserving and passing on are identified, the timeline is presented and overall plan for short -and long-term actions is described.

The Time Machine can lead to an increased appreciation of emotional value of people in a city. It provides possibilities for society to strengthen its own history and identity and considers also the social cohesion with physical transformations of places. (Lindhout 2018, Veelders & Wezenberg 2019.)

2.2 Case studies

2.2.1 Playa del Raisio

In Raisio there is an ongoing development project on coastal shoreline for improving an existing beach area. The site is located between two large scale industrial areas, so the location is unique. At the moment main functions are recreational, there is for instance a marina and supporting services for that. The master plan allows various functions on the site. These range from recreational use to residential building, services, work, storage and even to industry and port.

Most interesting feature in the project is the publicity and people’s interest in the case. It is unofficially named Playa del Raisio which in itself shows a certain sense of humour and irony. Exceptional location and nearly megalomaniac plans for site development also seem to be compelling factors. This is a textbook example of good municipal marketing and pitching.



Picture 1 Hahdenniemi beach Photograph: Kari Heikkilä, Studio Karin Kukka Oy

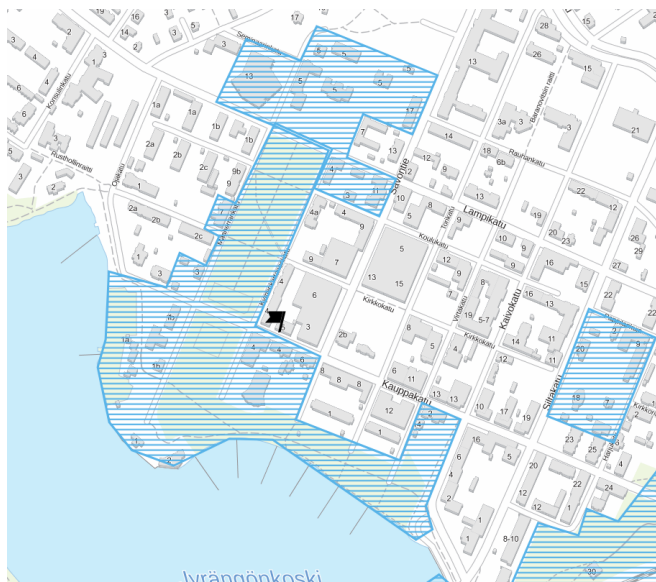
3 Site analysis and critical thinking

3.1 History

The urban development of Heinola began in 1776, when King Kustaa III divided the county of Kymenkartano and the administration of the new county and the governor's residence were transferred from Loviisa to Heinola. The first town plan was drawn up in 1779. In 1785, Governor de Geer drew up a new town plan, supplementing the older town plan with a wide park street, Perspective. In addition to the Vaasa Court of Appeal Park, Heinola Perspective is one of the most significant park compositions implemented in Finland at the end of the 18th century. It has retained its structure and shape despite new construction. The later town plans of the city center were largely based on a proposal approved in 1785. (Museovirasto 2009, Wager 2006: 40-41.)

The current outfit of the Perspective park is from the late 19th century. The Spa Park, Rantapuisto and Heinola Harbor, established in the late 19th century on the shores of Jyrängönkoski, are connected to the Perspektiivi. Construction of the Rantapuisto park began in 1892 after the completion of the first spa in Heinola. (Wager 2006: 40-41.)

Perspektiivi, Spa-area and spa park are protected as an RKY area, a nationally significant cultural environment. (Museovirasto 2009.)



Picture 2 RKY area: Perspektiivi -park area,

Rantapuisto and spa area. Map: Museoverkko.fi.

Heinola Spa- area

Heinolan Badhus Aktiebolag was founded in 1891. The first spa building was located south of the current summer theatre right by the stream. Heinola has been known from the spa which was oper-

ating in the city during 1892-1944. In 1814 the beach was fenced for sunbathing and in 1915 a toboggan run was built there. The old spa burned down in 1930 and the new buildings were completed on the brewery site in 1931. The stone-built spa building was planned by architect W.G. Palmqvist. (Heinolan kaupunki 2018:6-7.)

During War, the spa was used by the Defense Forces. The spa was closed in 1944 and the premises were leased to the Holiday Association as a rheumatology spa (1946-51). The buildings have housed e.g. Vocational school. The main library and environmental office used the main building 1974-1999.



Picture 3 An old picture of spa area. Heinolan kaupunki 2018.

Niemelä

From the 16th century, there was a manor-sized large farm, Niemelä, located on the northern shore of the Jyrängönvirta. Heinolan Polttimo Oy bought the Niemelä manor in 1905 and Koskensaari limited company established the so-called Niemelä's ylisaha. Nowadays there is a hotel Kumpeli in the area and remains of the Niemelä are gone.

The park area on the south side is potential relic area. Marked area (map below) can be a place for medieval or early modern village site. The grey spot near Hotel Kumpeli is the location of a destroyed Viking age cremation grave.



Picture 4 Grey dot is a location of a destroyed Viking age grave. Area marked with purple is potential relic area. Map: museoverkko.fi.

Near the camping area there are mounds of cultivation associated with clearing fields from stones. Stones are piled up in different kinds of piles, they can be round, fence like or oval. Green dots in the map shows that in Niemelä area there are 28 different kinds of mounds of cultivation.



Picture 5 Map of the mounds of cultivation, drawn by. Hannu Poutiainen. (Poutiainen 2021.)

In Niemelänranta there are several interesting and meaningful historical/ archaeological sites. The overall picture is quite unique. Landscape has stored different kinds of remains from multiple eras. Sadly the sites are not marked or made visible for visitors or for local people. Information about the past stories is difficult to find. This could for example be improved with information signs or mobile routes.

3.2 Nature in planning area

Total land area of Heinola is 839 km² of which 19 % is water and 81 % land. Share of forests and other natural areas of total land area is 90 %. In regional land use plan Niemelänranta has status as an area of urban activities. There aren't nature conservation areas or objects in the area. In Päijät-Häme green network review Niemelänranta hasn't been identified as having significant connections in surrounding green areas. (Heinolan kaupunki 2007, Päijät-Hämeen liitto 2021a, Virta 2021.)

Möljänpuisto is an open landscaped park area. Area north to Kumpeli is semi-maintained urban forest with both native and ornamental plants. The main forest types in the planning area are herb-rich forests and herb-rich heath forests (Kuivalainen 2022). Moving north towards Mustikkasaari, there is a shift to more natural state urban forest and the northern part of the planning area is mainly natural state forest with some indicators of cultural influence. Vegetation surveys could help in identifying possible locally valuable nature sites.

South-Häme nemoral forest zone reaches to Heinola and lake water systems surrounding Heinola improve growth conditions significantly. These water systems also define the landscape. (Heinolan kaupunki 2007.) Based on cardinal points, topography and the structures of waterfront, the planning

area is sheltered. Position is good regarding the light and sun, but wind can be an issue because of the barrier effect of the hillside.

3.3 Parks at Heinola

Planning area Niemelänranta is a part of Heinola national urban park. Two specific locations connected to planning area are the historical spa and the beach and the islands of lake Ruotsalainen. The main landmarks in the spa area are Satamamakasiini and Hotel Kumpeli. The area has significant values of cultural history. In the lake Ruotsalainen area two main landmarks are the bridges of which Tähtisilta is closely connected to Niemelänranta planning area. There are also cultural values of travel and recreation connected to Heinäsaari camping area. The area has also significant landscape values. Some natural habitats and sites are protected by forestry act. All the shorelines in planning area scenically valuable and there are also several important lines of sight in the area. (Heinolan kaupunki 2007.)

In recent Heinola park survey the focus has been in the historical parks of the city centre. The parks connected to planning area are well studied and proposals for actions are given. Ojakatu park area between sports ground and waterfront should be developed to nature-based stormwater collection and treatment area in accordance to city's stormwater management plan. (Taipale & Lahti 2014, Kuusiniemi ym. 2022.)

3.4 Recreational activities

Existing recreational activities in the planning area are frisbee golf track, campfire spots, outdoor area for dogs, beaches, camping site, marina, playgrounds, snow mobile route, rug washing site, cross country ski route, beaches, saunas, sports ground, fishing and ice fishing. In winter time also facilities for ice swimming are provided in the historical spa area. (Heinolan kaupunki 2021a, Kuivalainen 2022.)

Additional and interesting recreational activities that are available elsewhere in Heinola are lean-tos, MOBO-orienteeing and outdoor fitness/workout stairs and a yoga spot. These could be used also in the planning area. (Heinolan kaupunki 2021a). Present camp fire spot could be improved and also new ones could be established. There are also plans on building on outdoor gym for elderly people at Möljänpuisto in 2022.

Other possible recreational activities for the area could be touring skating, outdoor aqua jogging, packrafting, geocaching, guided nordic walking, urban or theme orienteeing with linkage to nature or history and diving.

New business opportunities for the area could be provided by rental companies providing recreational equipment. Such activities are SUP-boards, canoes and kayaks, skishoes and snowshoes, kick sleds, fatbikes, trailer saunas, trailer hot tubs, pedal boats and tree tents. Traditional jetskis are scoped out because of the disturbances they cause. Electric jetskis called waveflyers cause less disturbances and emissions. Sustainability aspect connects to renting equipment instead of purchasing and private ownership of them because renting decreases personal consumption. Consuming services instead of consuming goods can also be considered environmentally friendly.

Instead of floating houses, possibilities for floating recreational structures were considered. These could be cafés or restaurants with terraces, performance stages, hot tubs, saunas, cabins, bathing huts or padel fields. Joint pier and deck structures could also be used to connect the different areas across waters. Also floating artwork could be feasible, but these require moving to dry land for winter and depending on the location also some kind of anchorage might be needed because of the currents.

3.5 SWOT-analysis

Strengths

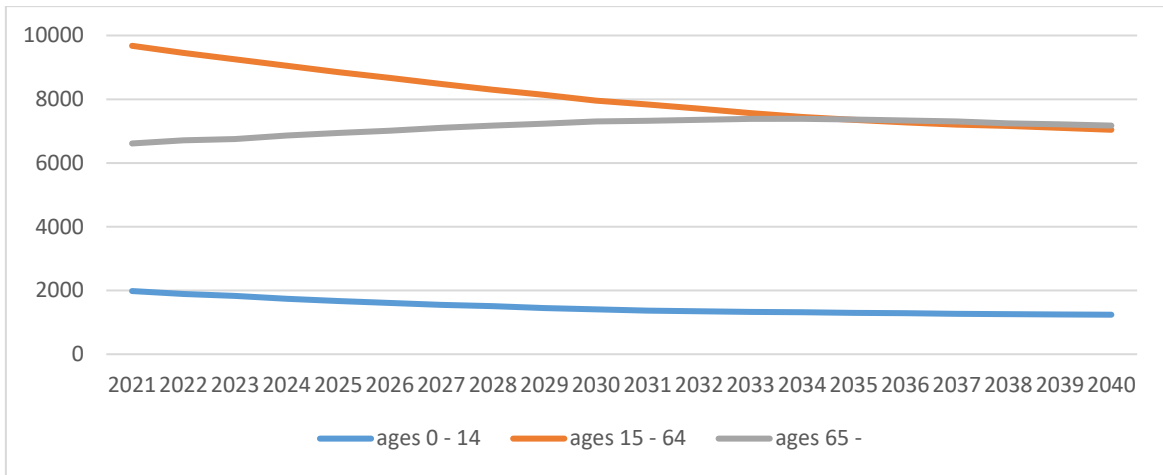
One of Heinola's strengths is the location. It only takes a 30-minute drive to Lahti and 1,5 hours to Helsinki 1,5 million people and 50 % of Finnish business life are within 150 km radius from Heinola.

There is a wide diversity of nature in Heinola and the proximity of water features the town centre. Heinola also has long cultural, recreational and industrial history. Good and versatile sporting facilities are available right at Heinola centre.

Weaknesses

The noise from road E75 passing Heinola via Tähtisilta causes noise disturbance. The noise is spread without hindrances because of the bridge height and surrounding open water areas. It is possible that it is reduced in summertime when the trees have leaves. Traditional noise barriers aren't likely to function in this case and could compromise scenic values from Tähtisilta and the waterfront. Ultimate noise reducer would be a tunnel, but this isn't probably feasible. On the other hand, the tunnel could highlight the landmark value of Tähtisilta.

Population is already declining, and this is projected to continue in the future. This trend is presented in picture 5.



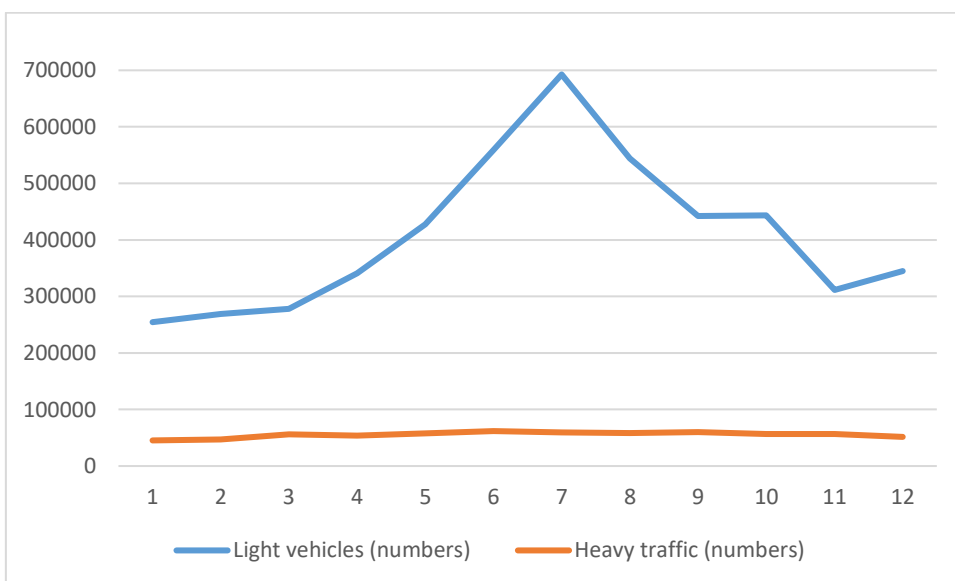
Picture 5 Demographic projection at Heinola 2021-2040 (Tilastokeskus 2022a)

In the planning area the rug washing site should be converted into dryland washing site because of negative environmental impacts of traditional rug piers. In this case, the site could be moved to completely different location. In the Heinäsaari marina parking spaces aren't sufficient and there is an increasing demand of berths.

In wintertime conflicts occur between cross country skiers and pedestrians in the outdoor routes of the area. A new outdoor route for avoiding these could be closer to shoreline, but the challenge is in winter maintenance. The route would have to be reasonably sized for maintenance reasons, a simple hiking trail or path would be insufficient.

Opportunities

Traffic flow on E75 provides a possibility for increasing and developing travel and tourism and improves also business opportunities. There is a massive increase in the number of light vehicles passing Heinola in summertime. This is presented in picture 6.



Picture 6 Traffic flow at LAM-point 628 Murhamäki, Heinola in 2021 (Fintraffic 2022)

Due to COVID19-pandemic there is increasing demand for safe recreational outdoor activities practised individually or in small groups. Domestic tourism has also grown dramatically over two years. In planning area best possibilities for improving travel, tourism, accommodation and food services are linked to areas around Hotel Spa Kumpeli and Heinäsaari Camping site. These can provide new business opportunities. COVID has also increased multi-locational work and interest in dual municipalityship. This can bring new working age residents to Heinola.

Threats

Niemelänranta is now mainly in recreational use and the shift from public space to private can cause opposing and resistance to change from people in Heinola. Adding new interesting recreational activities can reduce resistance. Some concerns are raised by occurring vandalism in public areas.

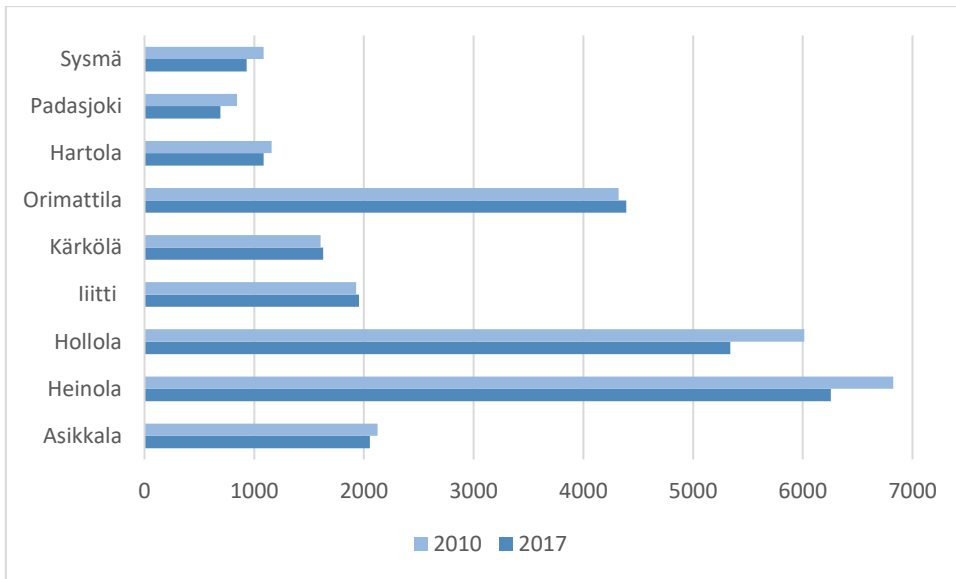
3.6 Residential and business satisfaction

Latest surveys have been done in 2021 by the Heinola city and the Päijät-Häme regional council on residential satisfaction and business prospects in Päijät-Häme region.

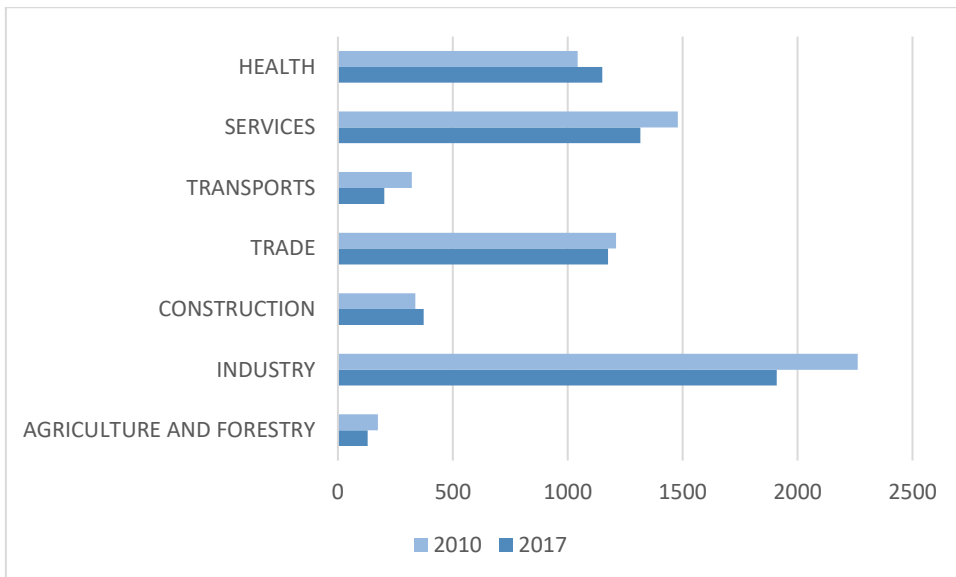
At Heinola some residential concerns were raised due to population ageing and with the migration of younger people to cities. This decline is presented in picture 6. The employment situation was also considered as a threat. But in all, the residents feel comfortable, happy and safe at Heinola. (Heinolan kaupunki 2021b.)

With local businesses the strengths are related to good locations and connections and also the possibility to work multilocally provides an opportunity. Some stated that crossing municipal boundaries for better co-operation in business life could be improved. (Päijät-Hämeen liitto 2021b.)

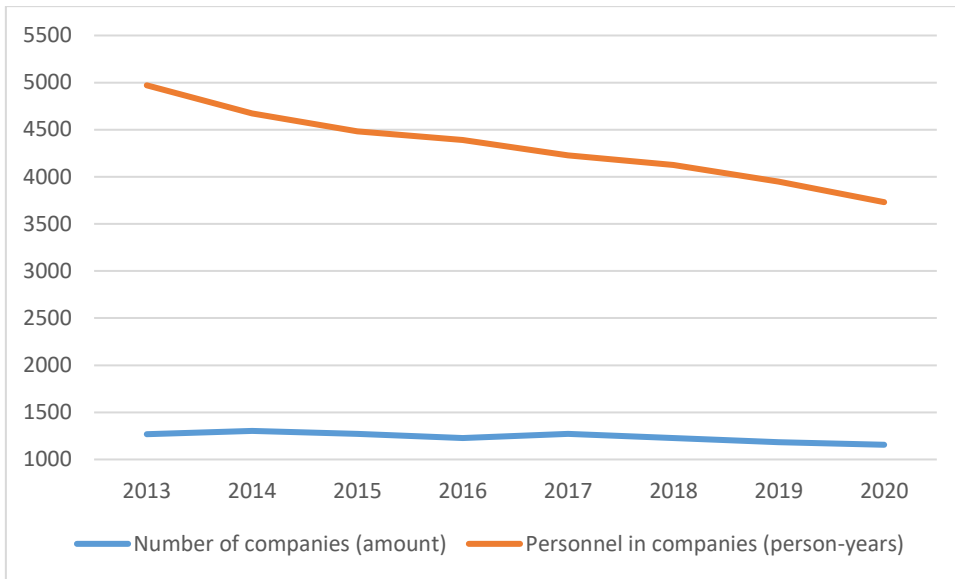
Number of businesses, workplaces and personnel have been decreasing in Heinola mainly on industrial fields. Despite this the turnovers don't show same steady declining trend. So remaining companies are obviously performing quite well, and the number of companies might not be as important as the performance of companies. When compared to other Päijät-Häme municipalities Heinola shows good numbers in workplaces. Pictures 7-10 present these trends graphically. These figures are important, because successful and growing businesses will produce jobs and by that eventually also working age population will grow. It might be useful to pay more attention on those sectors where the workplaces aren't reduced and could have growth potential.



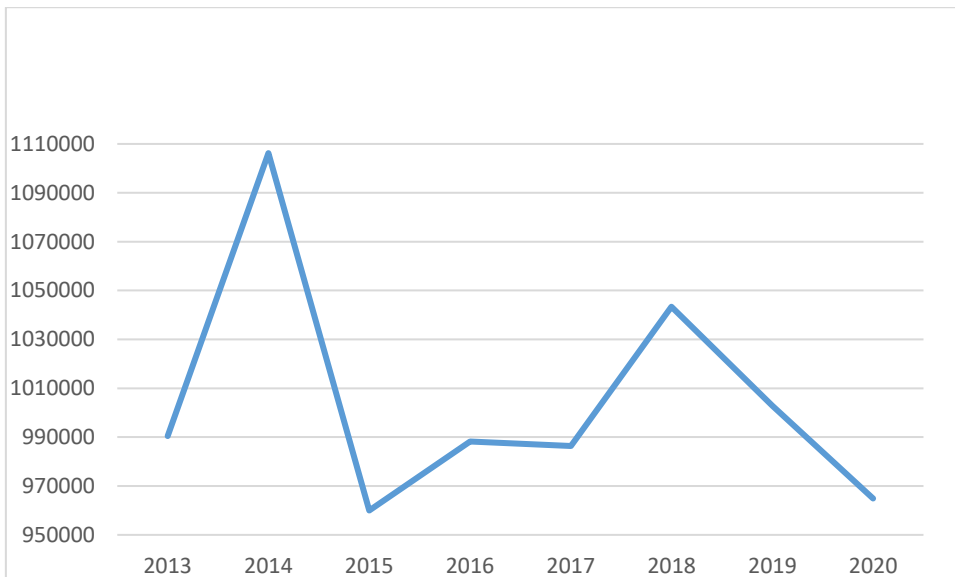
Picture 7 Number of workplaces at Päijät Häme municipalities (Päijät-Hämeen Liitto 2021c)



Picture 8 Number of workplaces at Heinola by industry (Päijät-Hämeen liitto 2021c)



Picture 9 Companies at Heinola 2013-2020 (Tilastokeskus 2022b)



Picture 10 Sales of companies at Heinola (1000 €) (Tilastokeskus 2022b)

4 Results, development proposal

4.1 Development proposals

According to the SWOT and site analysis reported in the previous pages, population and workplace declinations are seen as two weaknesses in the area. All those findings and analysis taken into account; we came to conclusion to propose with some attractive ideas that could be able to attract tourism in the area not only from within Finland society but also the tourist who come to visit Finland. Consequently, these ideas and solution can help to promote branding of the Heinolla area, create job opportunities and make a reputable sense of identity to the area that people become motivated to live there.

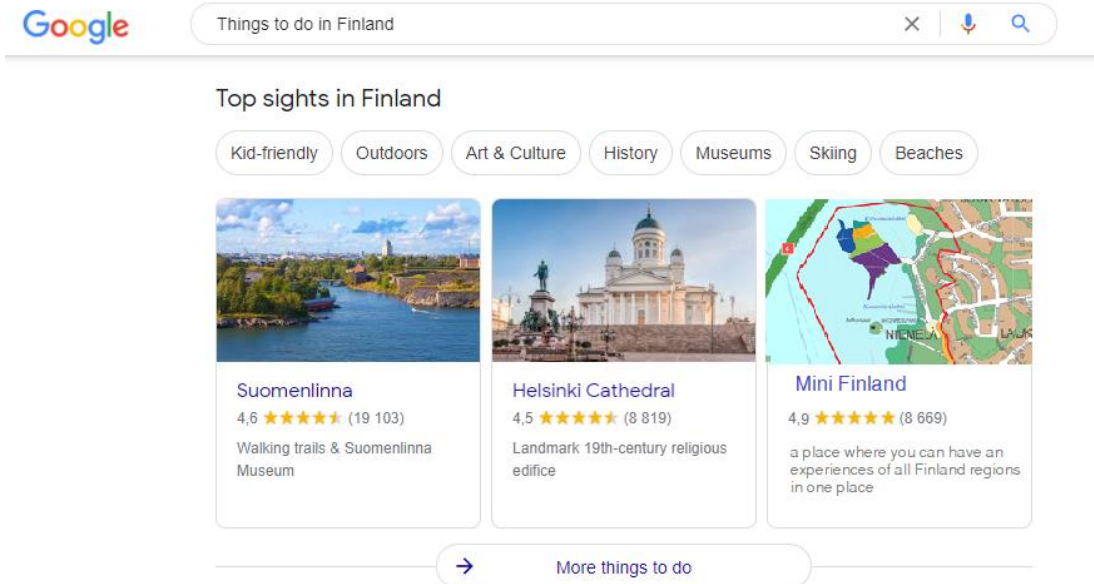
The core part of the proposal is the **mini-Finland** island that divided into five sections, each section is allocated for different activity that resembles to five regions of the whole Finland.

Each activity is chosen according to each region that what they are famous for.

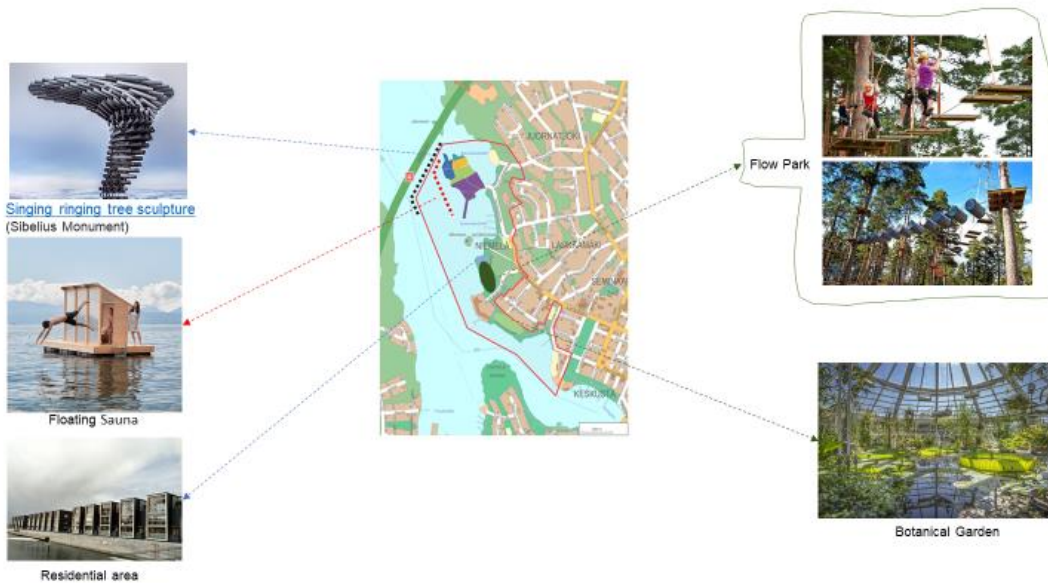


Vision:

Mini Finland is a place where you can have an experience of all Finland regions in one place.



The second part of the proposal includes: Singing ringing tree sculpture, ITE arts sculpture, Lakeshore pathways, Floating sauna, residential area, flow park and botanical garden which is discussed in detail in the following.





4.1.1 Singing ringing tree sculpture

The most common threat in such recreational spots in city is the sounds of vehicles from nearby roads. On the site the nearby motorway is a major threat to the peace & calm environment for the user of the area, so these unpleasant sounds were transformed into pleasant sounds by installation of a very interesting idea of singing ringing tree sculptures which are hollow steel pipes assembled in wind directions towards to noise side. When wind & noise pass through the steel tubes it will act like flute and a flute music will be generated. This is not a new idea but already implemented in some part of the world which really worked well. For such type of places eliminating noises is a very challenging part.



4.1.2 Floating sauna:

Any development will be incomplete without sauna in Finland. This is another very interesting feature on the site. It will be an amazing experience when fire is combined with water. better for economic perspectives in which private investors will show more interest. Several events will be held in floating sauna for example birthday parties, wedding anniversaries celebrations and many more annual activities which will generate money. The structure will be floating made of wood resembles like boat in function.



Picture 11 Floating sauna

The floating sauna will integrate a mixture of cold and hot therapies in amongst nature to help leave feeling restored and ready for the days ahead. Soak up the heat in the sauna, then plunge in the cold of the lake, all while taking in the beauty of the surrounding singing ringing tree sculptures.

Experience an invigorating experience in a floating sauna and the charm of a traditional Finnish campfire and picnic. Users will have the opportunity to experience the health benefits and warmth of a floating sauna. While bathing in the sauna, people can quench their thirst by jumping into the fresh water. This floating sauna is a real experience in Finnish river nature.

4.1.3 Residential area:

To accommodate the tourists & local people accommodations in apartments & individual small portions are also provided which will attract more people. Airbnb model or some other renting platform can be used. This will also attract more investors to construct it from preferably prefabricated materials. The residential area in all development will generate revenue on the site. Also, more

competition for the accommodations will lower down the prices in the vicinity hence attracting more people on the recreational area.



Picture 12 Residential area on the Site

Residential area will range from different size depends on demands of the users. In majority flat there will be three rooms with a shared kitchen so that to accommodate different people. A lounge or other interactive spaces combine for all flats will be provided to socialize and share on the spot. This will increase interaction & discussion among the Finish people and people who visit from abroad to learn their culture.

4.1.4 Flow Park:

Among singing ringing tree & floating sauna, flow part is also very healthy and entertaining element which can flourish the site more as compared to other activity. This idea is not a new one but also one can be found in different place of Finland which is quite successful.



Picture 13 Flow Park

Flowpark is an ecological adventure park where child & adults can test their courage. Adventure courses have been built on living trees without harming them. Users may solve numerous tasks even at the height of twenty meters. Different tasks refer to ropeways, including swaying paths, liane jumps, swings and cable slides.

Every Flowpark is unique, so there are no two identical courses. Flowpark has been meant for all people and all ages full of adventure spirit. The site has already a thick forest in which free park can be accommodated very easily without disturbing the real essence of trees there. Flow part is the only space which will increase the value of the forest and will make user to enjoy their moments with young one in a healthy activity.

4.1.5 Botanical Garden

This is a unique feature of our proposal that we take into consideration every age group there. Botanical garden will be a place for old people where they will be busy in gardening & other such activities. Each portion of the botanical garden will represent different area of Heinola which will bring a sense of belonging to the space. There will be variety of plants, flowers, and vegetables with a sophisticated water infrastructure & drainage mechanism. This will engage old people on the site and will be act as research centre for the agricultural department in nearby universities. Students of related field will also spend time here for better quality outcome of the botanical gardens.



Picture 14 Botanical Garden

Although horticulture is a form of culture that has existed for thousands of years, the first botanic gardens were not established until the Renaissance era, or more precisely, in the 1540s. Nowadays, there are over 2,500 botanic gardens in nearly 150 countries.

Botanic gardens are also an excellent tool for independent study. They can inspire new ideas for home gardens or provide people with information about the flora of other countries. Botanic gardens interact with society in other ways as well. The domestic horticulture industry, for instance, obtains specialties for production, and diverse botanical expertise can aid citizens and authorities with plant related problems. In recent decades, the new, melancholy mission of botanic gardens has been to participate in saving the plant kingdom. As many as half of the approximately 300,000 plant species in the world are in danger of extinction in the coming decades. More and more species are finding their last haven in the plantations and seed bank vaults of botanic gardens.

ITE arts sculpture installations:

ITE art = Art by non-educated artists that is created in the context of everyday life in Finland. This is a common entertainment activity which is framed in our site for tourists. Many people are still unaware of this art. So rather than installing alien sculptures on the site it is good to promote local artists and local craft of the area. The proposed area is intended to create various art related activities and exhibition in the area. Annually there will also be ITE art competition organised by different student community and universities which will bring charm and networking opportunities of the local and people coming from other different areas. A small museum will also be accommodated in the Master Plan depending on the interest of the users in future.



Picture 15 ITE Art sculptures

These art related activities are very important for an area because it flourish creativity and provide opportunities for networking in area.

4.1.6 Lakeshore pathways:

All the amenities on the site will be connected by vegetated pathways. Different paving materials will be used in these pathways. Stones will be used in many pathways to incorporate a very organic look of the pathways thus making the circulation on the site more natural and freer. These pathways will be in different shapes and design depends on the area. Some will be straight and other will be curve to give user a sense of surrounding and discovery. Main pathway will run near the lake in shape of steps which will also protect the shoreline.

Materials used in constructing a path will set the tone for the entire walkway experience. There's a variety of materials that can be used. Shredded bark and pine needles create a soft informal path. Brick makes for a more formal pathway. Stone offers a plethora of different options, from crushed gravel to large flag stones woven together. Imagination in making a material selection is key. Curved paths work best in informal gardens because of their natural, casual appearance. Curves

beckon visitors to come on a journey to discover what lies around the bend. The natural, flowing shape of a curved walkway also evokes a feeling of relaxation. A small garden can be made to appear larger by hiding the end of a curved path behind a structure or plants. This will trick the eye into thinking that more lies ahead. However, you have to be careful to not overdo the number of curves; if you do people will be apt to take shortcuts through your garden. To emphasize a path's organic shape there will be a variety of plants along its edge and allowing them to spill over onto the path.

4.1.7 21st century orchard

History

Local tradesman Ulrik Lindholm built the present city museum as his personal residence in 1872. The building is surrounded by large park area and an orchard that Ulrik established. He was entrepreneurial and owned a beer factory and several trade businesses. He was also very active in local politics and was elected to the first city council 1873. Ulrik passed away in 1890 and in his last will he donated large land areas and estates to municipality. A charity fond was also established and money was donated for charitable purposes. It has been said that he wanted to direct all profits provided from the orchard to public benefit purposes, especially for local children. In 2025 it will be a jubilee year because it has been 200 years from Ulrik's birth. A new orchard could be established for celebrating his legacy. Perhaps a park volunteer action with Heinola-seura could be launched alongside with the orchard project. (Heinola-Seura 2020, Kansalliset kaupunkipuistot 2021.)



Picture 11 Crab Apple in Tasha Tudor's Garden in Vermont Photograph: Richard W. Brown

Plant still the appletree

In Finland there is an ongoing and increasing craze of using pink sargentii cherry trees in landscaping. New parks with cherries are being established throughout southern Finland.

Sargentii cherries have reddish tone in their foliage only in spring, leaves turn green in summer. Autumn colour is vibrant red. These cherries rarely produce berries and they are native in Japan, Korea and Russian Far East.

Purple crab apple trees also produce lovely pink or red flowers in spring or early summer. Some varieties have reddish colour in the foliage through summer, this increases their ornamental value. In natural areas the foliage can be too distinctive, so these might suit better for landscaped or semi-urban forest areas. The foliage has also good autumn-colouring. In addition, crab apples usually produce small fruits that are highly popular and important as bird feed. There is a wide range of Finnish crab apple tree varieties available nowadays. There are historical connections to apple trees in Heinola, orchard surrounds the city museum and also the Niemelä estate had an orchard.



Picture 12 Finnish crab apple variety, *Malus Purpurea* 'Eläinmuseo' Photograph: MTT

Downside with ornamental cherries and apples is that they require protection from wildlife after planting. They are relatively low maintenance otherwise. Best locations for orchard are on sunny and open spaces. Recommended location for this is the park area between Ojakatu sports ground and waterfront. The orchard could be included in planned stormwater collection and treatment area. Alternative location could be Möljänpuisto. More natural state orchard could also be set at the urban forest area above Kumpeli.

4.2 Communication and participation

Heinola has good and updated communication strategy. They have quite good numbers in FB followers. Communication survey for residents was done 2021, but only 31 answers were received. Best

channels for communication were FB (68%) and newspapers and homepage (61 %). Electric infoscreens and ja LinkedIn were least used or popular channels. (Heinola 2021c.)

Homepages are separated between Heinola, Business Heinola and Visit Heinola. Different organisations and fields are producing blog texts and these can be found at Heinola homepage. There is also an electronic bulletin board at Heinola homepage. Different channels of social media are used effectively and organisations are using slightly different medias. Used channels are FB, Instagram, Twitter, Pinterest, Youtube, Whatsapp and LinkedIn. Trimble is used as a feedback channel for residents and city also uses Webropol. Announcements and information are communicated also in local newspapers, electric infoscreens and at events. Heinola hyppysissä-information leaflet is published few times a year in paper and as an e-version. This is targeted for residents. Marketing magazine is produced twice a year, summer and winter, also as paper and e-version. This is distributed in Lahti, some regions in Helsinki and it is also available at local businesses and tourist infos. (Heinolan kaupunki 2021d.)

The communication is already well executed, but some ideas concerning the Niemelä planning could still be feasible. Business Heinola is already using email newsletter, so there might already be experience within the city organization on how effective this is as an information channel. Basic newsletter could be produced monthly, but first this requires subscribers. Heinola hyppysissä-leaflet could be produced as a special edition with topics related only on Niemelänranta planning. It could be distributed also as a handout in local events and happenings, schools, library, supermarkets etc. Webropol survey or questionnaire could be done related to Niemelänranta planning. Social media channel coverage is good, but TikTok isn't in use. This might attract younger people, but it is obviously a resource issue as well. Perhaps a temporary Niemelä blog could be established. This could also be a channel for residential commenting and feedback. In Facebook using link purchases and attached publications could be used, so information and messages don't get lost in the news feed. Educational campaign against vandalism might be useful. The damage could be demonstrated through the repair costs and the amount of work required.

Residential participation is executed in various ways and the goal is to enable equal possibilities for participation in local policy-making. Besides of the councils for the youth and elderly and disabled, there are also separate panels for families with children, business life and villages and neighbourhoods. Resident surveys and residential events are organized regularly and it is possible to act also through participatory budgeting and municipal initiatives. (Heinolan kaupunki 2021e.)

Workshops for the residents relating to Niemelänranta planning could be arranged and student course works could be used as templates for discussions and sharing thoughts. Park volunteer groups could be established to share the workload of city park department.

5 Conclusions, recommendations

There is an increasing trend in Finland for densifying existing built-up areas by planning. This is partly due to demographic transitions and partly because it has been seen as a climate change mitigation action. The downsides of urban densification though haven't been taken into account enough and the perspective of end-users might be missing in some extent. Densification can lead to reduced possibilities for climate change adaptation and poor resident satisfaction. The residential survey in the Päijät-Häme region was executed by Päijät-Hämeen liitto in 2021. For permanent residents the availability of services and good connections to other regions were most important factors, but also close proximity to nature and water and peace and space were valued. For secondary residents the nature, water and peace were the most valued factors considering the location. (Päijät-Hämeen Liitto 2021d.)

Private land ownership containing building closer the waterfronts reduce greatly people's possibilities to make use of their everymans rights concerning the shorelines. This connects also with the observation of MURCS students, that the islands Mustikkasaari and Heinäsaari in the planning area are in a sense "forbidden ones". They aren't available for full public use and despite the values of cultural history of the camping area, the location is no longer ideal because of the noise issue. In Heinola 19 % of total geographical area is water, so waterfronts and shorelines can be easily accessed by residents, at least in the city centre. That is, if these areas only remain free for this use. Transforming existing public and accessible places with recreational values to private and closed ones is likely to be opposed by residents.

Demographic projections show decline in population of Heinola and there are already existing empty residential buildings in the city centre. From the sustainability perspective it is advisable to use existing dwellings instead of building new ones, if there isn't forcing need to do so.

Of total land area of Heinola, land covers 81 % and of which 90 % consists of forest and other natural areas. Regarding to these numbers and the amounts of vegetation and soil, Heinola is a massive carbon sink. Instead of reducing these figures with unnecessary building, Heinola could be announced as the carbon sink capital of at least Päijät-Häme (or shared status, because neighbours are also doing well, Padasjoki has 91 % and Hartola 88 %). (Päijät-Hämeen liitto 2021a.)

6 Evaluation of group work

The workload was shared so that Finnish students provided and worked with the background materials and site analysis. These analyses are done in accordance with student's professional skills. Some additional materials were originally produced only for supporting background purposes, but are now presented also in the report because of the placemaking value and the qualities they have. MUrCS students were in the charge of the maps and producing development ideas for the area. The aim was to take full advantage of their creativity, innovativeness, different perspective and the possibility to create and present ideas with a true novelty value.

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