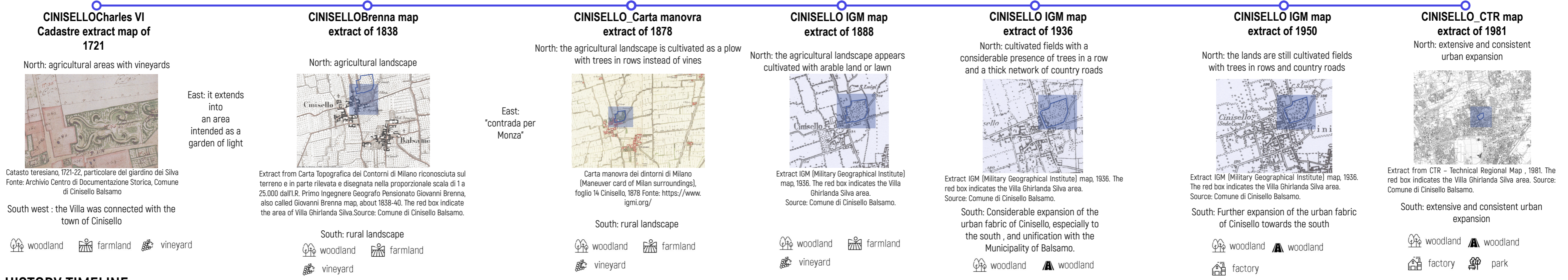


RAISING AWARENESS OF THE HISTORICAL VALUES OF HISTORIC PUBLIC GARDENS: GUIDELINES TO PLAN COMPATIBLE USES AND ACTIVITIES IN HISTORIC GARDENS

—THE CASES OF VILLA GHIRLANDA SILVA PARK IN CINISELLO BALSAMO AND VILLA BORROMEO LITTA PARK IN LAINATE

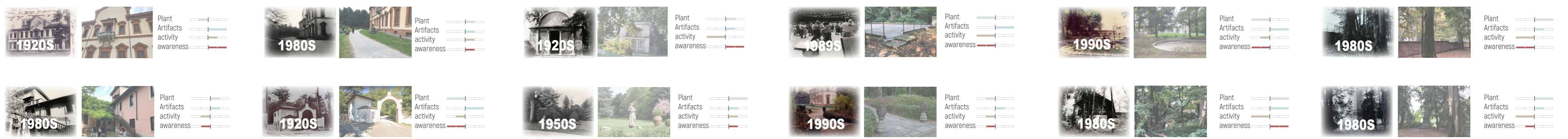
THE CHANGES OF THE CONTEXT



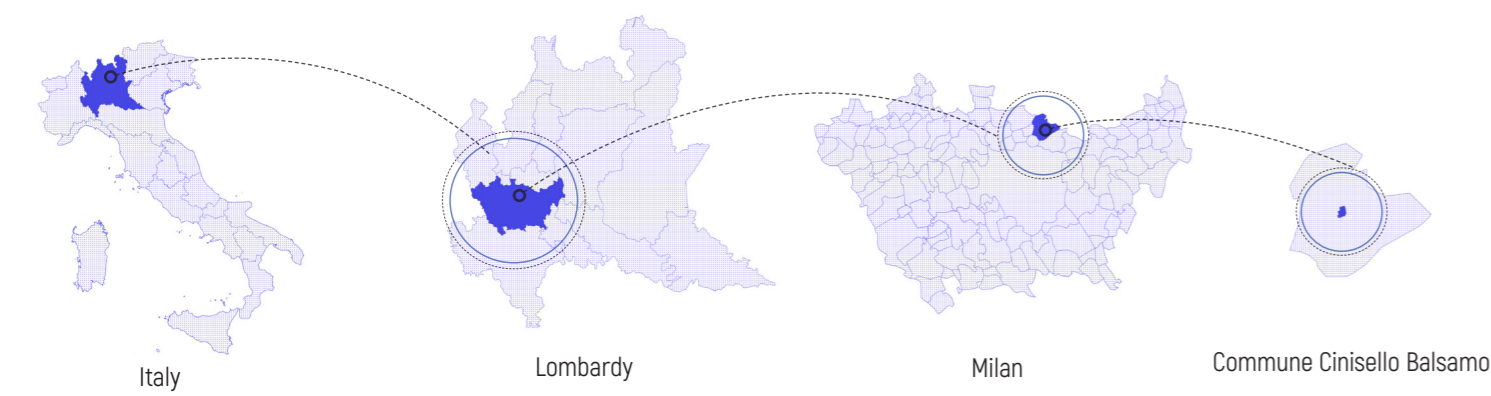
HISTORY TIMELINE



COMPARISON OF HISTORICAL PROPERTY AND CURRENT STATE

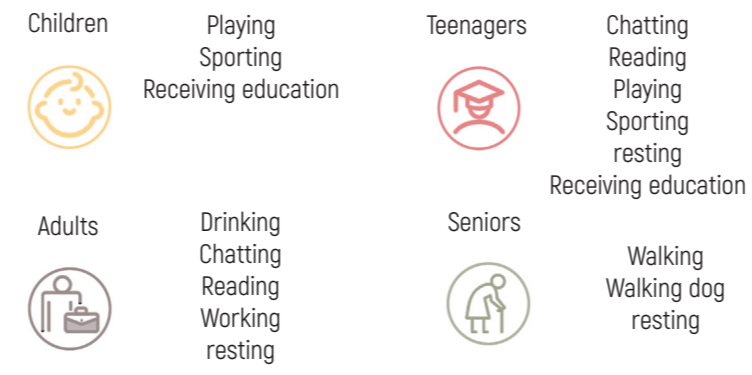


LOCATION ANALYSIS



Cinisello Balsamo is an Italian town located in the northern region of Milan in Lombardy with 73488 inhabitants. It was formed from the unification of the two distinct municipalities of Cinisello and Balsamo in 1928, which still identify the two main districts of the city today. Cinisello Balsamo has 2 historical gardens, Villa Ghirlanda Silva and Villa di Brema Forno garden, as well as a variety of open spaces that are not articulated thanks to the expansion of the urban fabric. The Garden of Villa Ghirlanda Silva is located in the heart of the commune of Cinisello Balsamo that has an extension of 12.7 km.

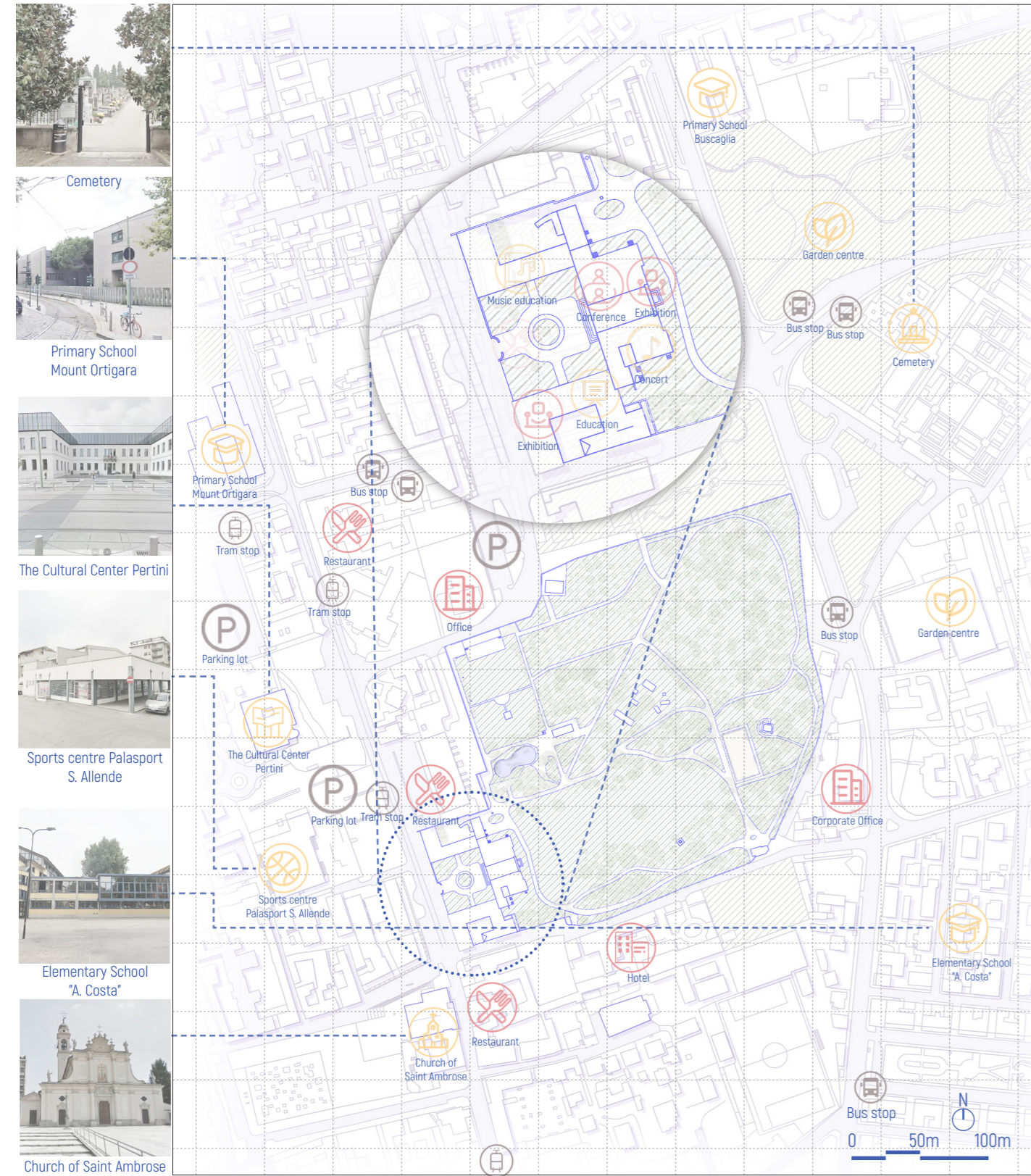
DIMANDS OF VISITORS' ACTIVITIES



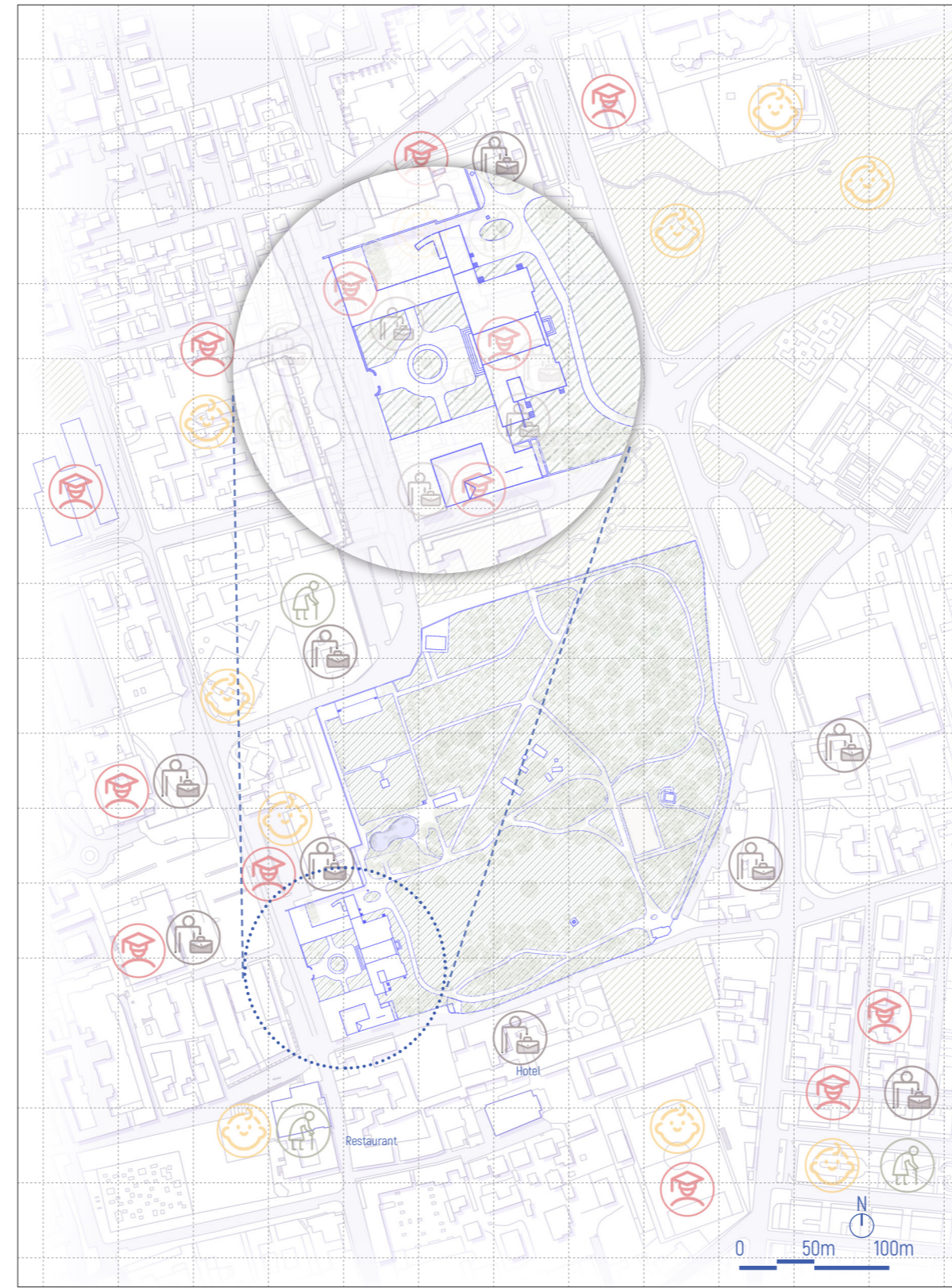
ACTIVITIES IN VILLA GHIRLANDA SILVA



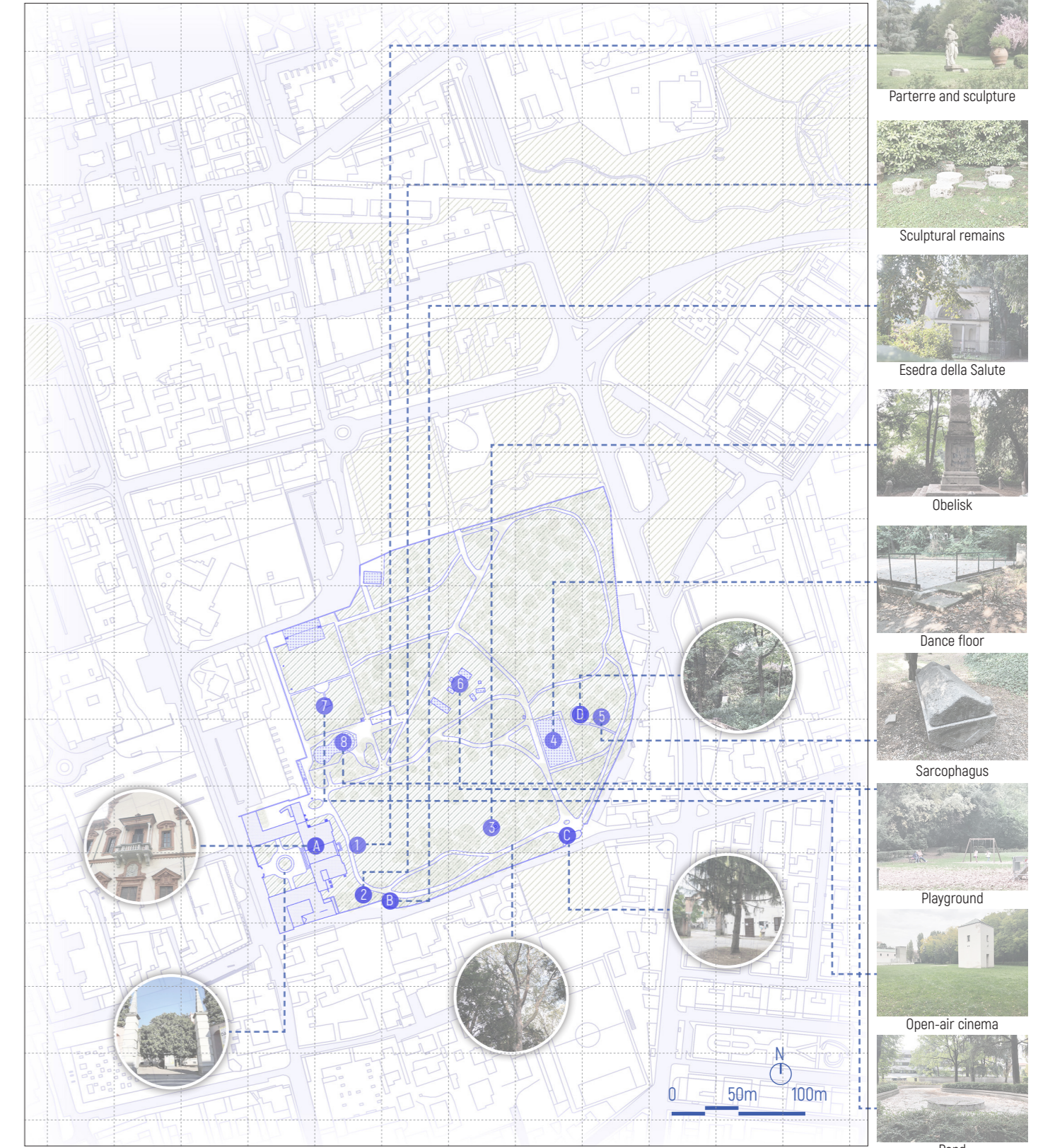
URBAN SURROUNDING CONTEXT ANALYSIS



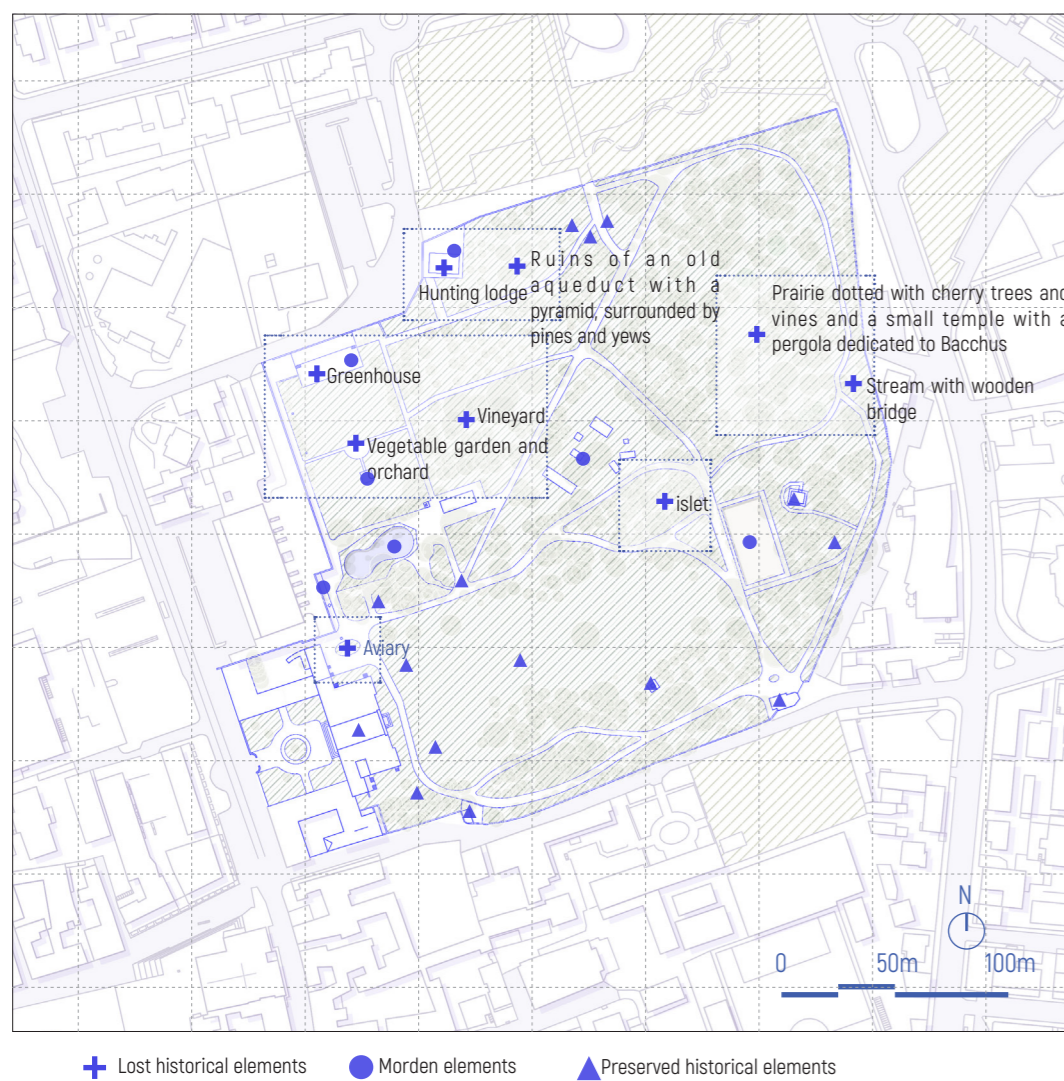
TYPES OF VISITORS IN THE VICINITY



DISTRIBUTION OF LANDSCAPE ELEMENTS



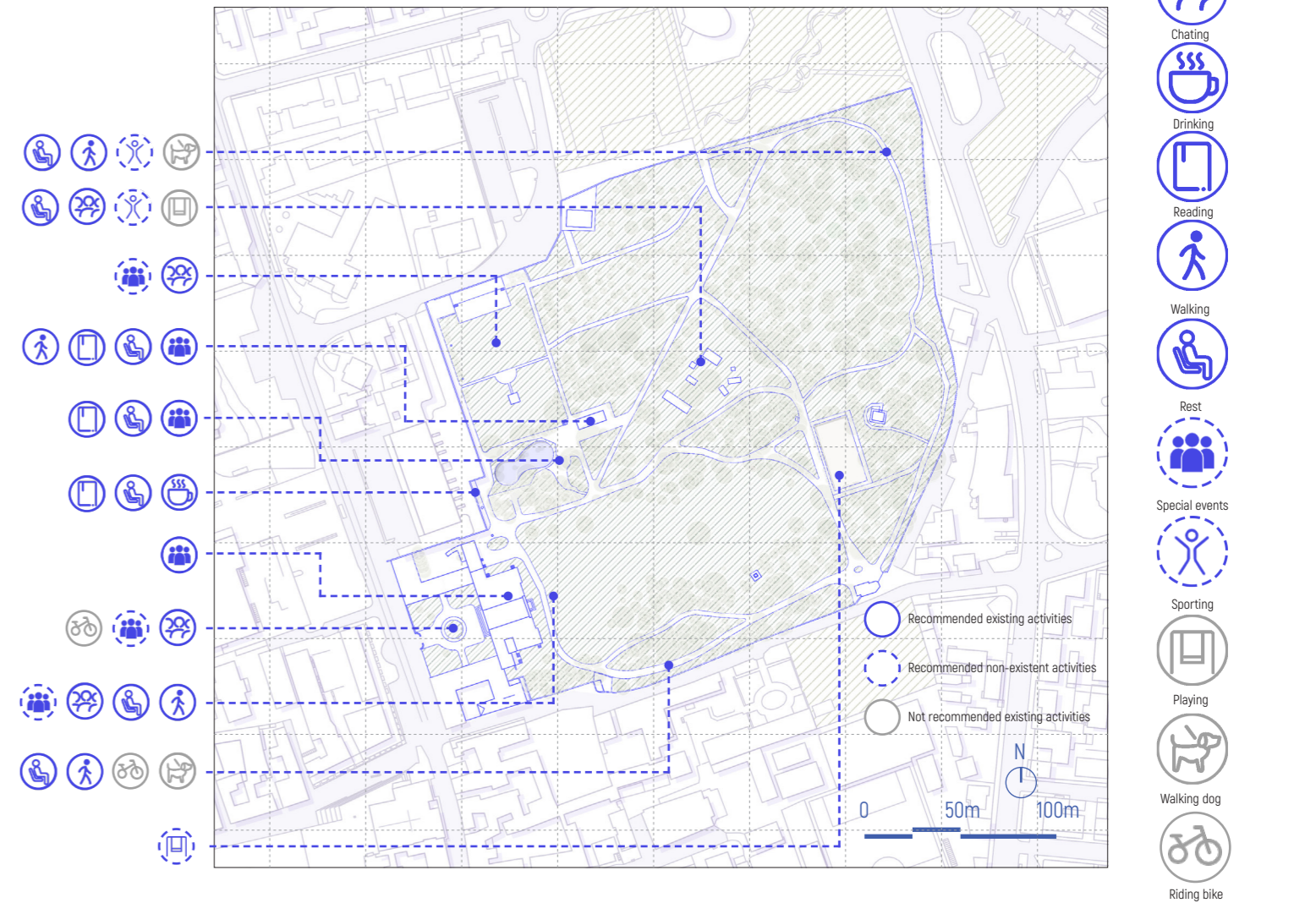
COMPARISON MAPS OF THE HISTORICAL AND EXISTING CONDITIONS



FEATURES ANALYSIS



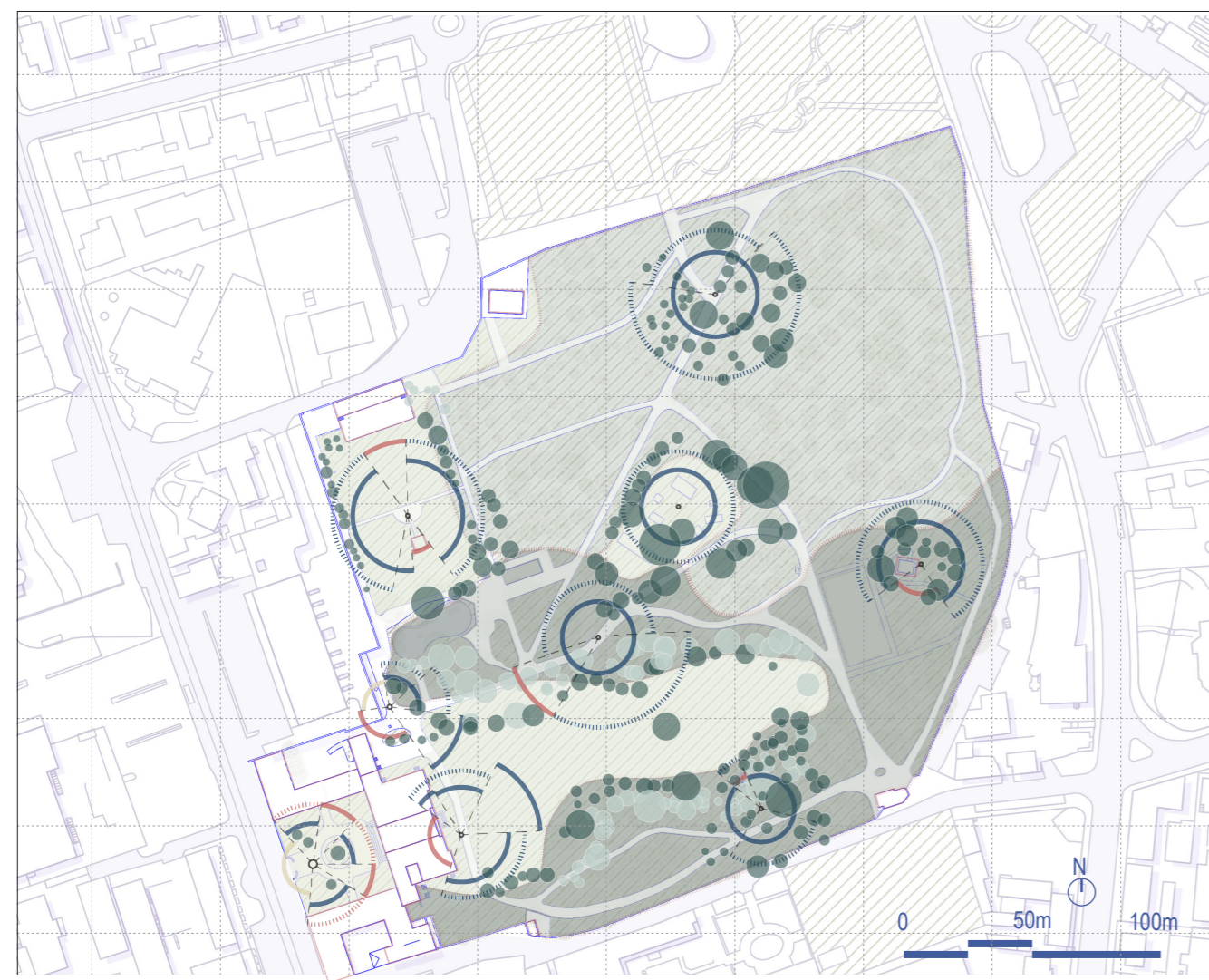
EXISTING ACTIVITY TYPES DISTRIBUTION



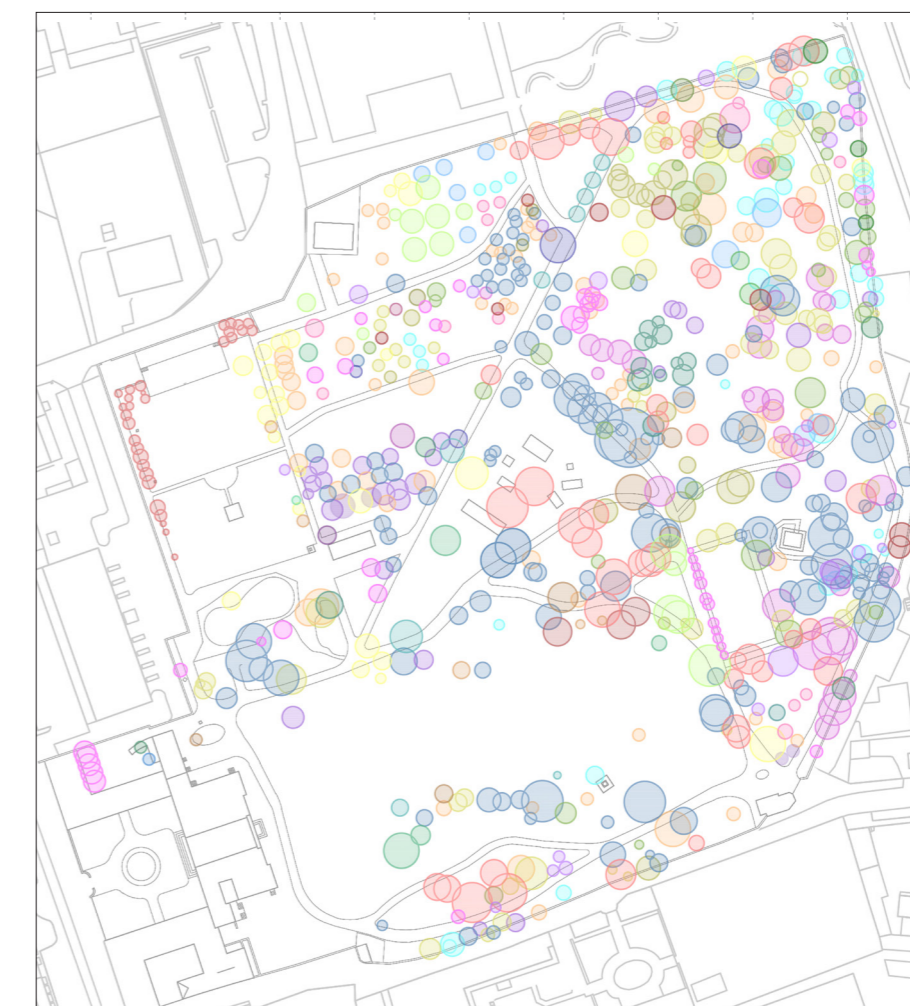
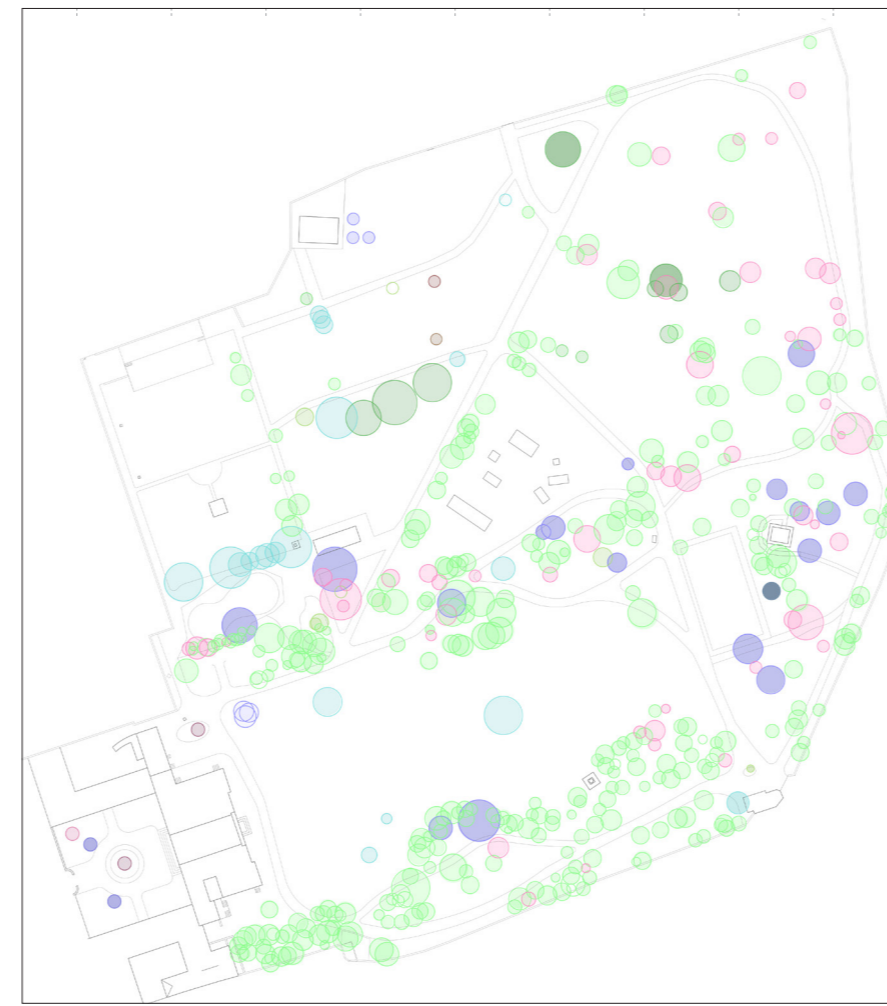
RAISING AWARENESS OF THE HISTORICAL VALUES OF HISTORIC PUBLIC GARDENS: GUIDELINES TO PLAN COMPATIBLE USES AND ACTIVITIES IN HISTORIC GARDENS

—THE CASES OF VILLA GHIRLANDA SILVA PARK IN CINISELLO BALSAMO AND VILLA BORROMEO LITTA PARK IN LAINATE

SPATIAL PERCEPTION AND SIGHT



TREE CLASSIFICATION



GARDEN CHROMATISM

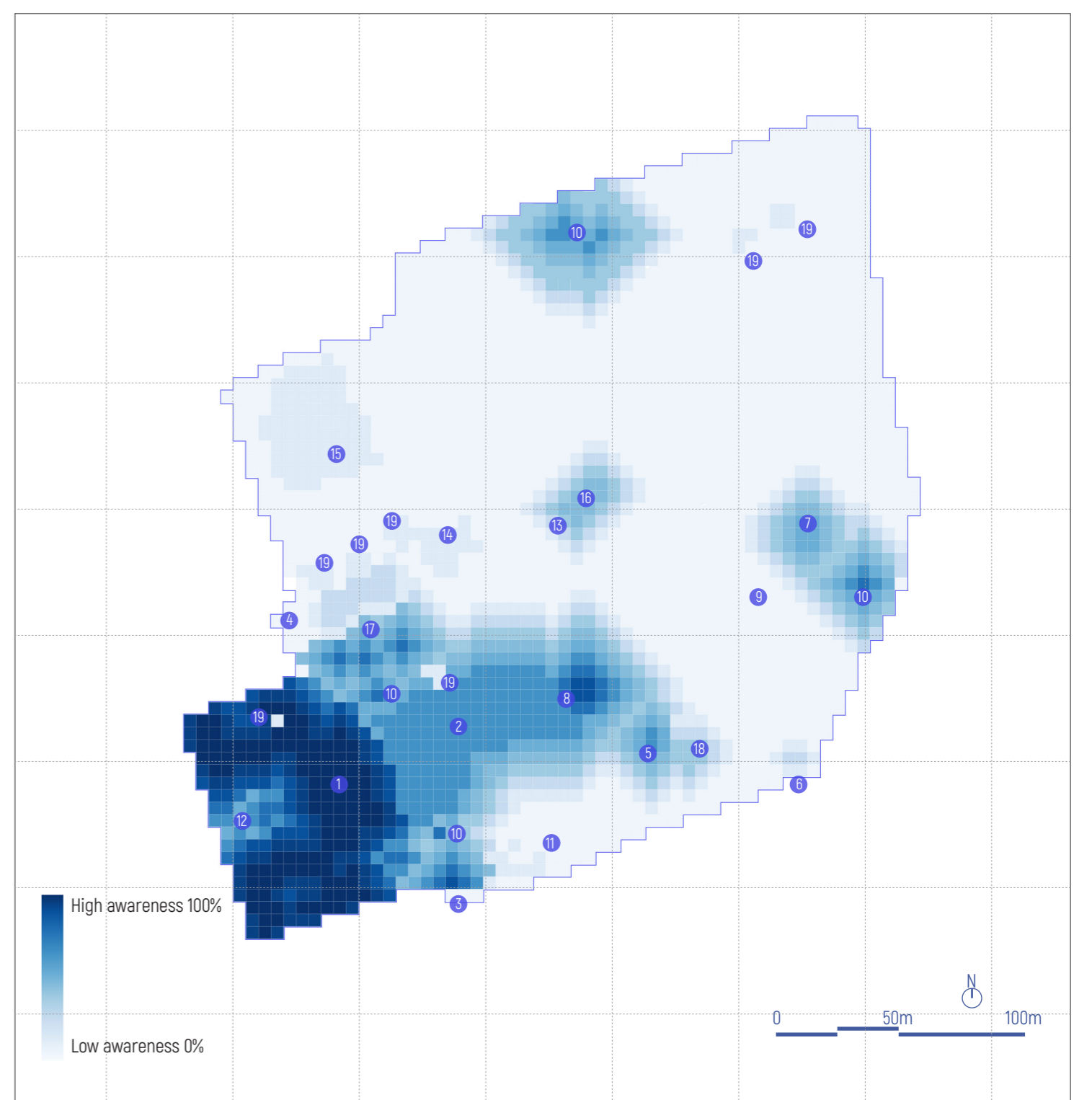


ELEMENTAL GRADING ASSESSMENT

ELEMENTAL CONTEXT ANALYSIS

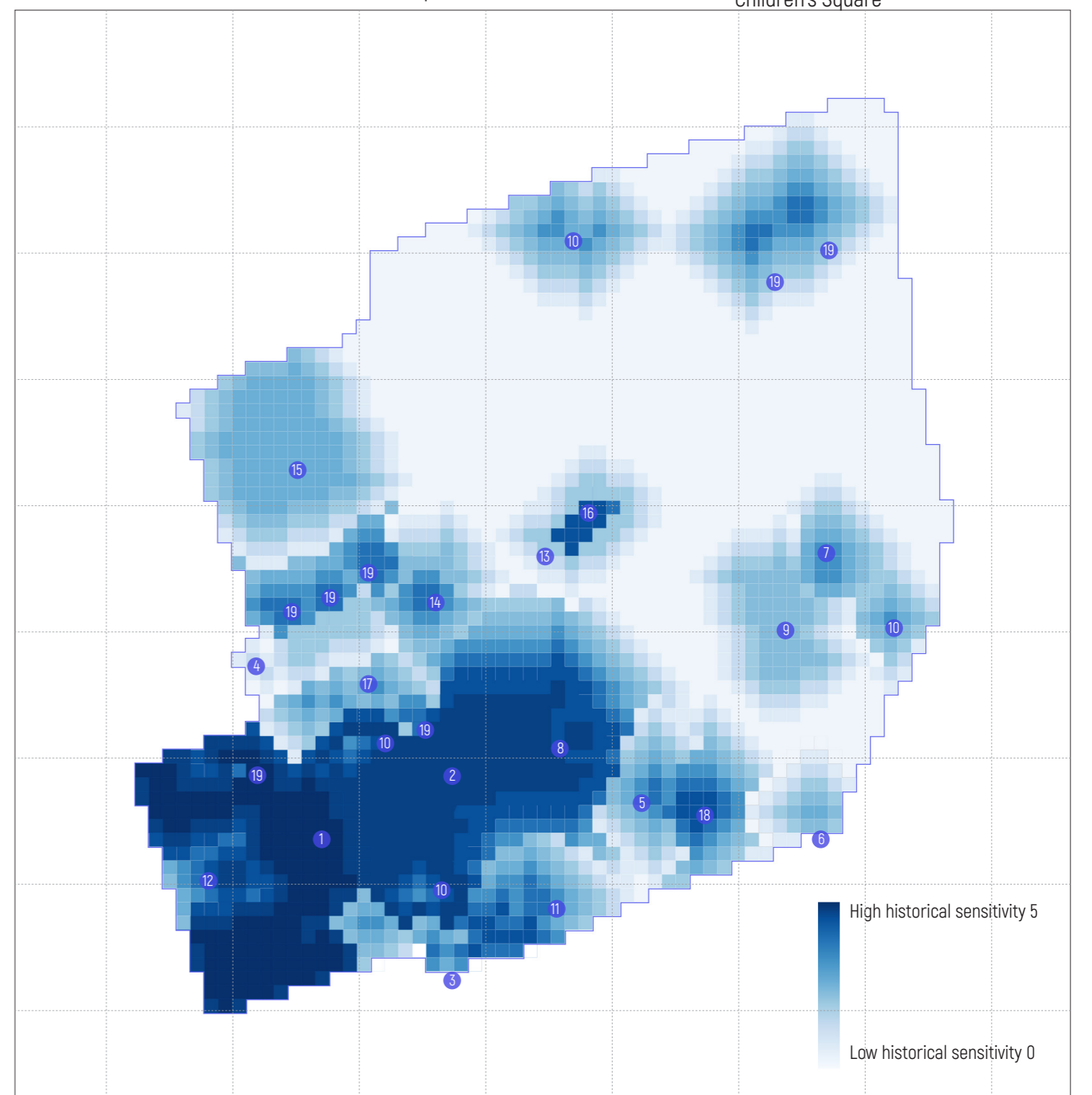
<p>01 Main entrance</p> <p>The main entrance faces the villa, and there is an evergreen magnolia tree of great value of culture and history. The entrance is in good condition. It is currently the most frequented used and maintained.</p> <p>Existing activities: Exhibitions, events Heritage value: Historical value, Botanical value Awareness of the value: High Status: Positive</p>	<p>04 Health Exedra</p> <p>The Exedra, built in the early 19th century at the request of Ercole Silva. The interior wall includes three recesses that previously housed sculptures (now disappeared), but the sculptural group of Hebe is still visible. The exedra area is currently secured with a gate to avoid vandalism on the monument.</p> <p>Existing activities: No Heritage value: Historical value Awareness of the value: High Status: Positive, Negative</p>
<p>02 Swiss Chalet and the hill</p> <p>The small hill was recorded in the views of as a viewpoint over the formal parterre. Ercole Silva built at the bottom of the hill an ornamental cave and at the top of the hill a Doric temple. Carlo Ghirlanda Silva replaced the temple with a Swiss Chalet.</p> <p>Existing activities: Used for meeting room of Auser voluntary association (Now abandoned) Heritage value: Historical value Awareness of the value: Weak Status: Negative</p>	<p>05 Open-air cinema</p> <p>In this area was previously present the greenhouse, the vegetable garden and the orchard. The open-air cinema is partly made of masonry structures, and partly from structures set outdoors.</p> <p>Existing activities: Outdoor movies, summer events Heritage value: Historical value Awareness of the value: Medium Status: Positive</p>
<p>03 Scottish Lodge</p> <p>There is a Scottish Lodge at the secondary entrance, following the landscape fashion of the time. The lodge represents the construction of the new building, confirming its importance.</p> <p>Existing activities: Used by caretakers and Auser voluntary association Heritage value: Historical value Awareness of the value: Medium Status: Positive, Negative</p>	<p>06 Pond</p> <p>The pond was built in 1978 and refurbished in 2013. The shape remains that of the late 1970s, but the rocks and surrounding vegetation are removed. The idea was that the replacement of materials gives a more modern image.</p> <p>Existing activities: No Heritage value: Historical value Awareness of the value: Weak Status: Negative</p>
<p>07 Bar</p> <p>There is a small bar on the north side of the villa, near the deserted pond, open only during the summer season, with space for outdoor tables. But the location is not suitable.</p> <p>Existing activities: Catering Breaks Heritage value: No Awareness of the value: No Status: Negative</p>	<p>10 Ruins and sculptural remnants</p> <p>On the lawn, some sculptures disappeared only the bases remain. Near the northern entrance of the garden there are three small columns, presumably belonging to the small temple dedicated to Bacchus, built in the middle of the vines-rows.</p> <p>Existing activities: No Heritage value: Historical value Awareness of the value: Weak Status: Negative</p>
<p>08 Playground</p> <p>In the garden there is a children's play area, built in 1999 and located in the central part of the park, at the foot of two large plane trees. The games (swings slides, stair turrets, bridges, slides and climbing nets) have a wooden structure and parts in plastic and metal.</p> <p>Existing activities: Children activities Heritage value: Botanical value Awareness of the value: Medium Status: Negative</p>	<p>11 Woody area</p> <p>A piece of green land located in the northeast corner of the garden. The vegetation relationship in this area is the most complex in the garden, which has important protection value. The area here is underutilized and can only be used to walk along the adjacent route.</p> <p>Existing activities: No Heritage value: Botanical value Awareness of the value: Weak Status: Positive, Negative</p>
<p>09 Skating rink</p> <p>At the foot of the hill, was converted into a paved skating rink, later also used as a dance floor. The area is raised above the ground level, has a tiled floor, and is surrounded by a metal railing. It is sometimes used for events during the summer.</p> <p>Existing activities: Sports Heritage value: Historical value Awareness of the value: Medium Status: Positive, Negative</p>	<p>12 Lawn</p> <p>There is an expansive lawn directly in front of the east side of the house. The lawn is the most significant green space in the garden, including many trees that existed at the beginning of the 20th century.</p> <p>Existing activities: Picnic Heritage value: Historical value, Botanical value Awareness of the value: High Status: Positive</p>

AWARENESS MAP

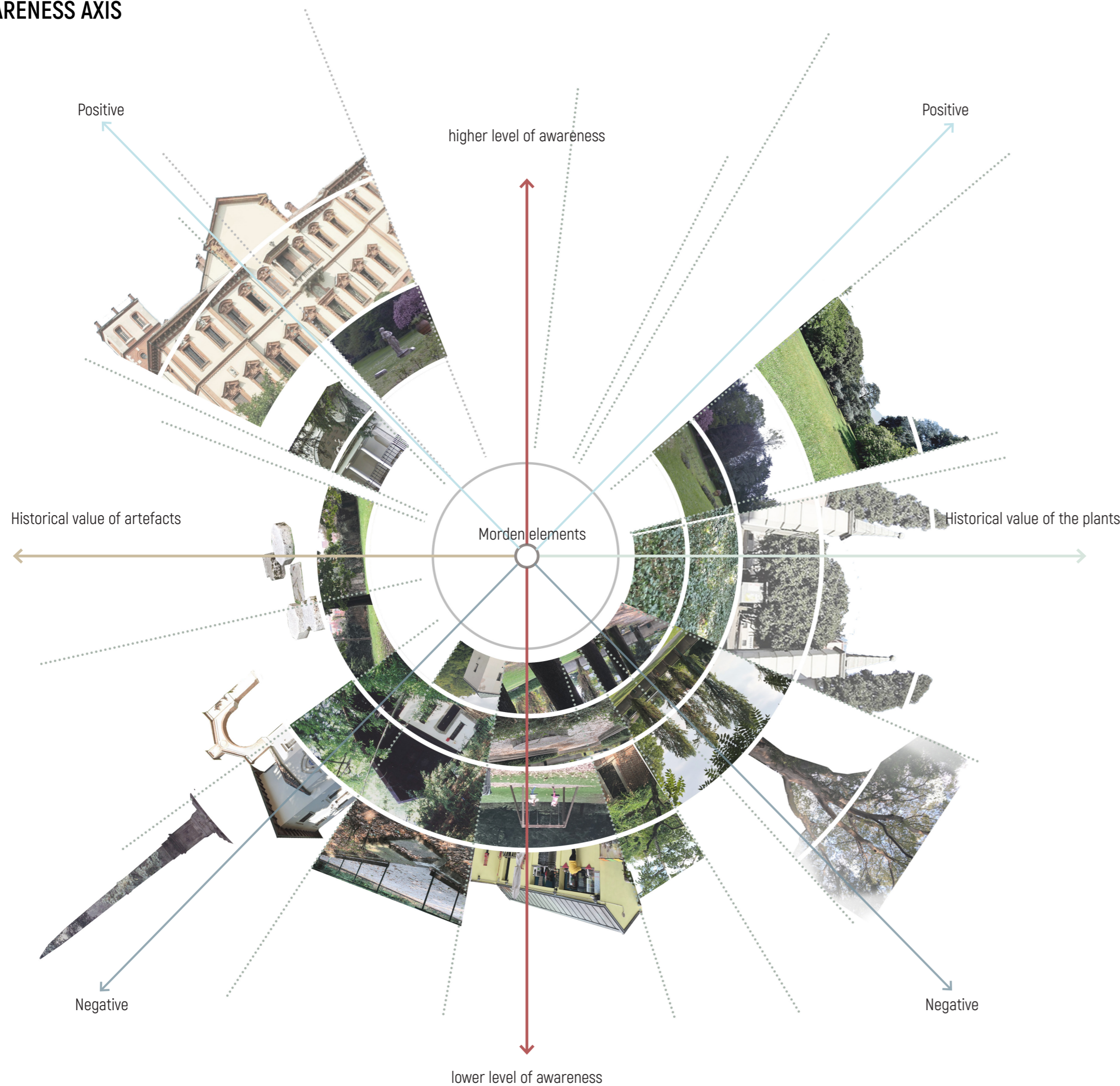


- 1 Villa Ghirlanda Silva
- 2 Parterre
- 3 Health Exedra
- 4 Bar
- 5 Obelisk
- 6 Scottish Lodge
- 7 Swiss Chalet
- 8 Cedar on the lawn
- 9 Skating rink
- 10 Ruins and sculptural remnants
- 11 Band of Taxus baccata next to the Health Exedra
- 12 Magnolia grandiflora in the centre of the entrance square
- 13 Playground
- 14 Music square
- 15 Open-air cinema
- 16 Remaining monumental trees
- 17 Pond
- 18 Celtis next to the Obelisk
- 19 Platanus acerifolia in the middle of the Children's Square

HISTORICAL SENSITIVITY MAP



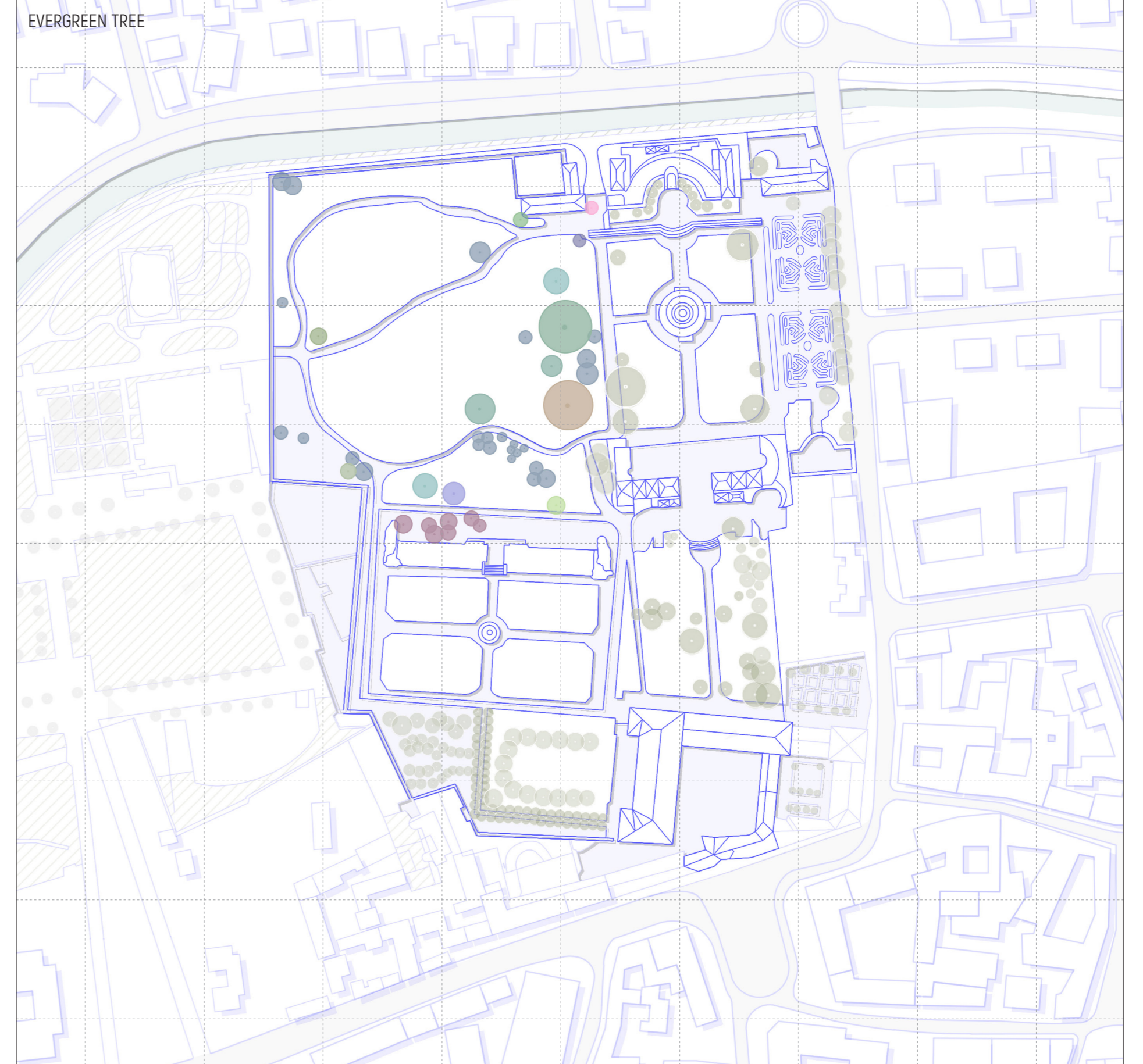
AWARENESS AXIS



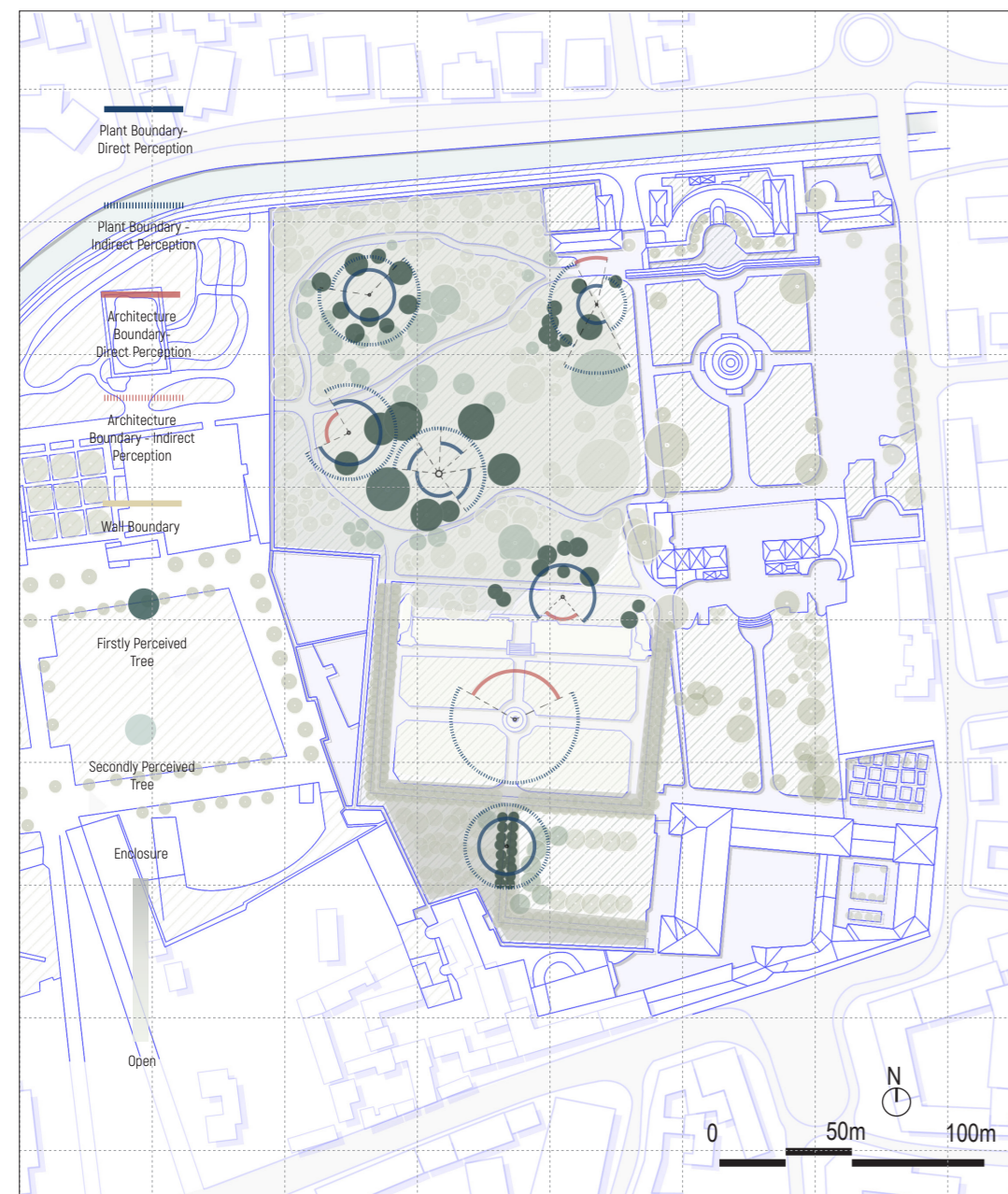
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TREE CLASSIFICATION

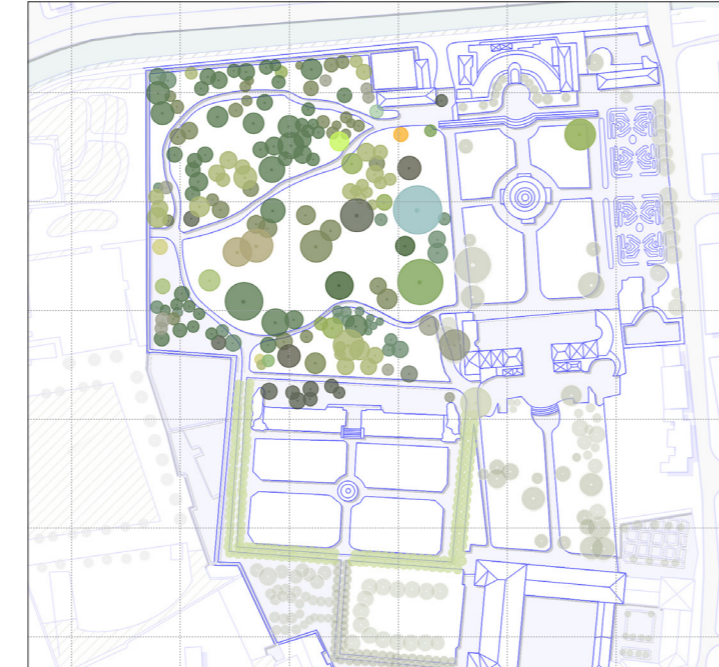


SPATIAL PERCEPTION AND SIGHT

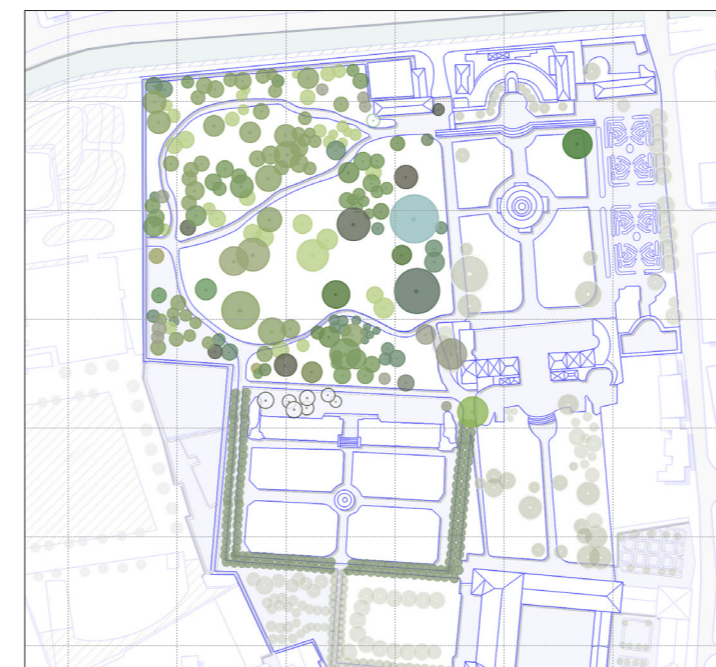


GARDEN CHROMATISM

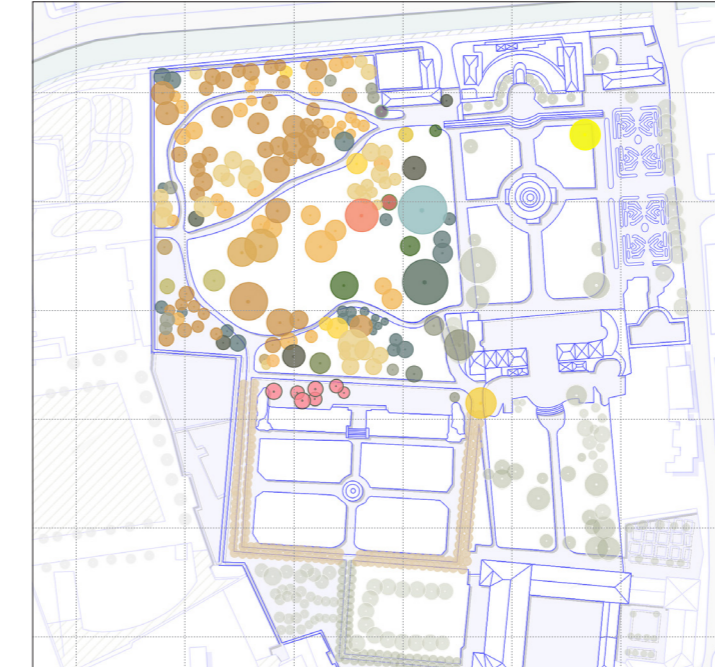
SPRING



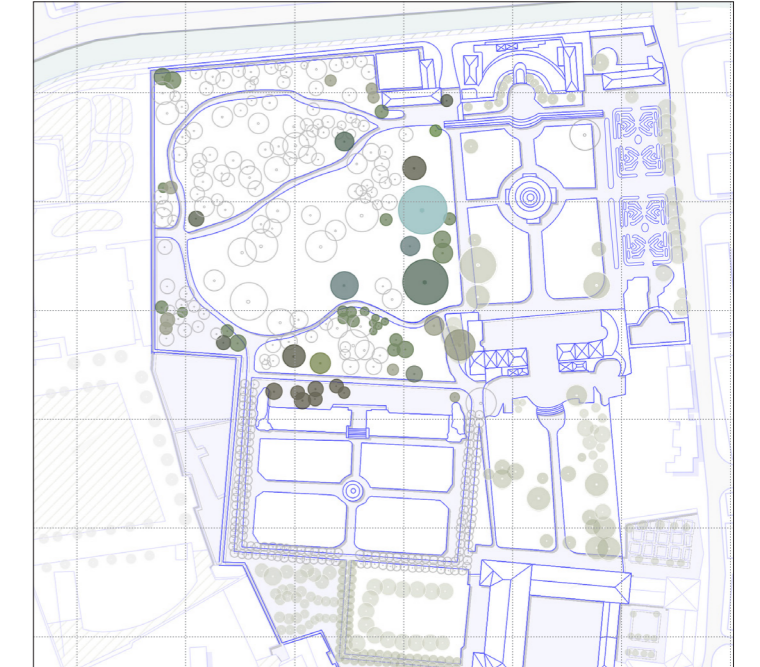
SUMMER



AUTUMN



WINTER



ELEMENTAL GRADING ASSESSMENT

ELEMENTAL CONTEXT ANALYSIS

01 the villa



The villa is the oldest part of the garden and is well preserved in its current state. The management arranges guided tours and regularly organises related events, and it is used quite frequently.

Existing activities: walking, sunbathing
Heritage value: Historical value
Awareness of the value: High
Status: Positive

02 Ninfeo



The water lilies are the most culturally and historically valuable and recognisable element of the whole garden. The current state is also well preserved and maintained. The management regularly organises related events and uses them quite frequently.

Existing activities: visiting, special events
Heritage value: Historical value
Awareness of the value: High
Status: Positive

05 Parterre and fountain of Nettuno



The fountain and the Baroque garden are better preserved historically. And there are regular events held on the lawn by the neighbourhood. Visitors are more aware of this part. So there will not be too much intervention in this section. However, there is no space to stay in this garden and visitors do not stay here too long unless an event is being held.

Existing activities: marketplace
Heritage value: Historical value
Awareness of the value: High
Status: Positive

03 Hornbeam gallery



The Hornbeam gallery is a landscape planted in the 18th century and has been well preserved and maintained. Its unique space allows for a good awareness of the garden's historic value.

Existing activities: walking
Heritage value: Ecological values
Awareness of the value: High
Status: Positive

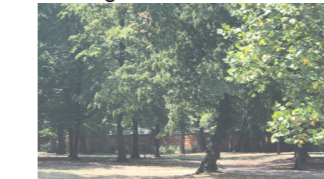
04 Parterre and fountain of Galatea



The fountain and the baroque garden are relatively well preserved historically and with guided l-led tours, visitors have much higher awareness of the historical value of the place. However, the nearby lawns are only experienced for very short tours, which are underused and visitors do not stay here for too long.

Existing activities: visiting
Heritage value: Historical value
Awareness of the value: High
Status: Positive, Negative

06 English Garden



Forms such as the layout of the garden paths in the English garden are lost. In terms of planting, in the past the garden had a tendency to activate the 'new wood' configuration through moderate differences in ground level, with irregular green compartments and a prevalence of tall trees and bushes. The interior of the garden today is almost devoid of shrubs, with a single spatial composition.

Existing activities: walking, sunbathing
Heritage value: Historical value
Awareness of the value: Low
Status: Positive, Negative

07 Greenhouses



The Tropical greenhouse is based on a 19th century conservatory that existed in the gardens and was restored to its function in 2015. This should be an interesting educational part in the public historic garden, if it is in an open state.

Existing activities: No
Heritage value: Ecological values
Awareness of the value: High
Status: Positive, Negative

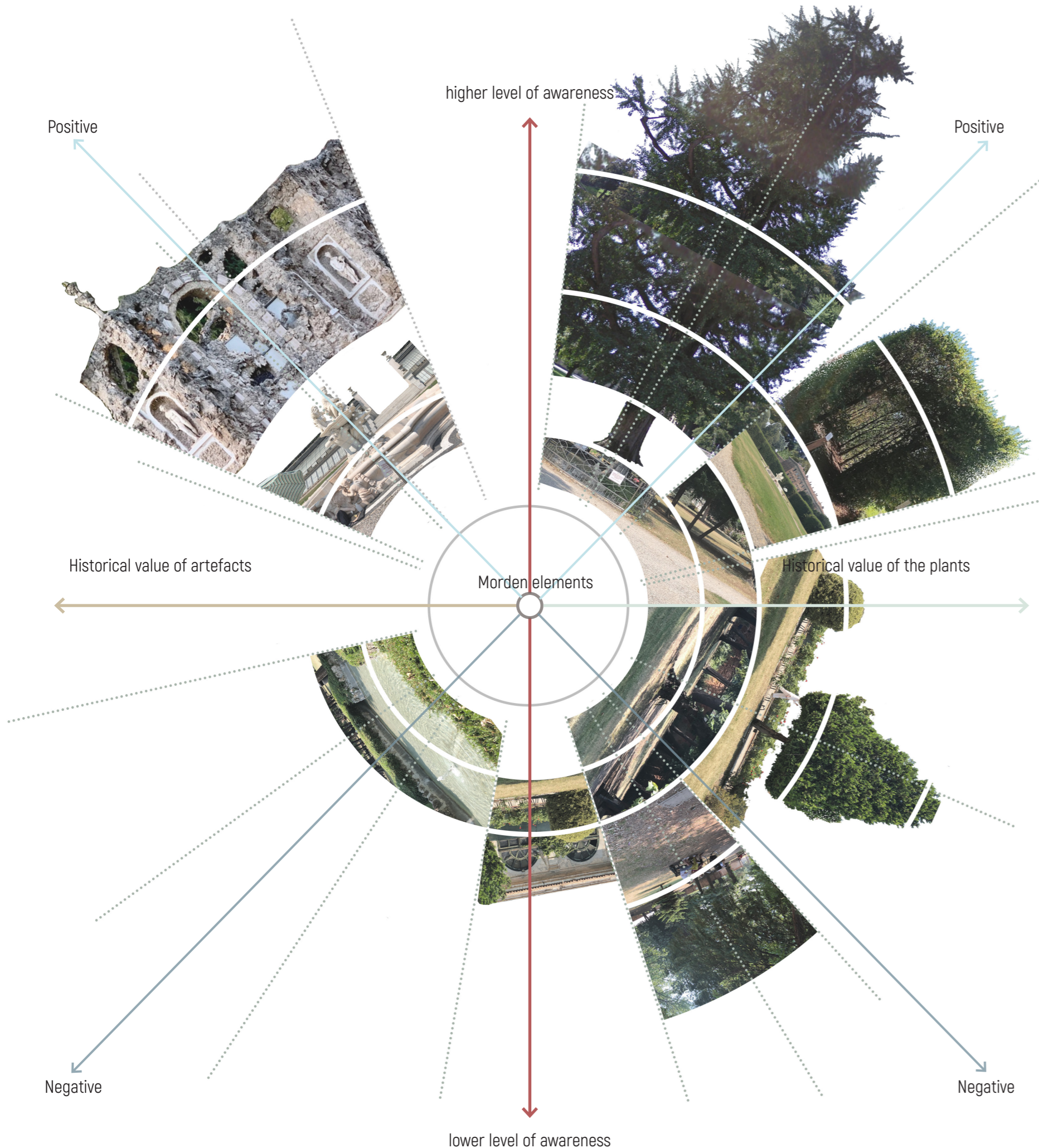
08 Protected Tree Species



The majority of the trees in the English garden were introduced when it was built in the mid-19th century. In particular, the ginkgos planted between 1850 and 1855 in the gardens are a treasured species in need of protection. Benches distributed under trees have a bad effect on the tree root system. The scope and manner of movement of people around historic and ecological plants needs to be restricted.

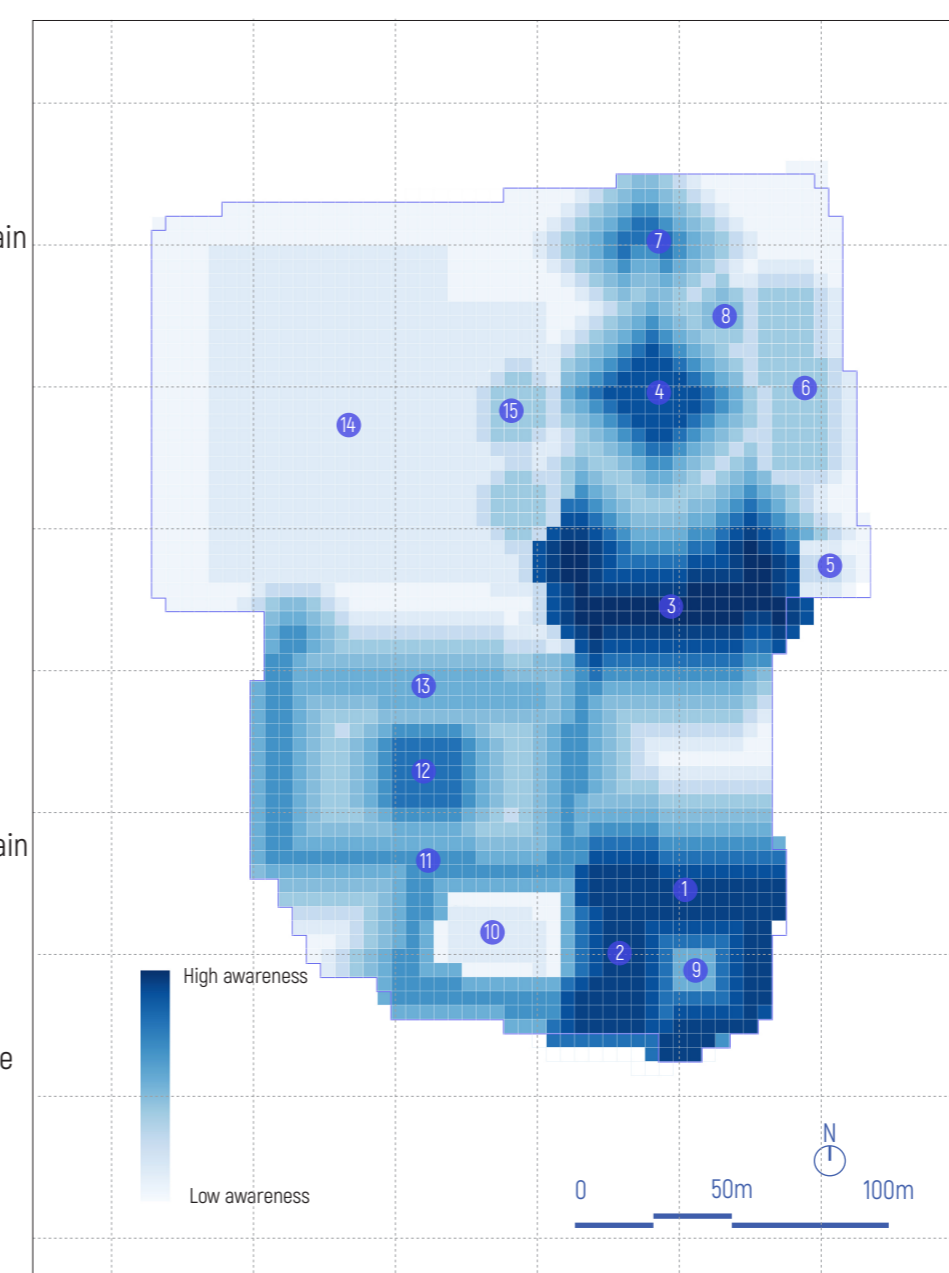
Existing activities: resting, chatting
Heritage value: Ecological values
Awareness of the value: Low
Status: Positive, Negative

AWARENESS AXIS

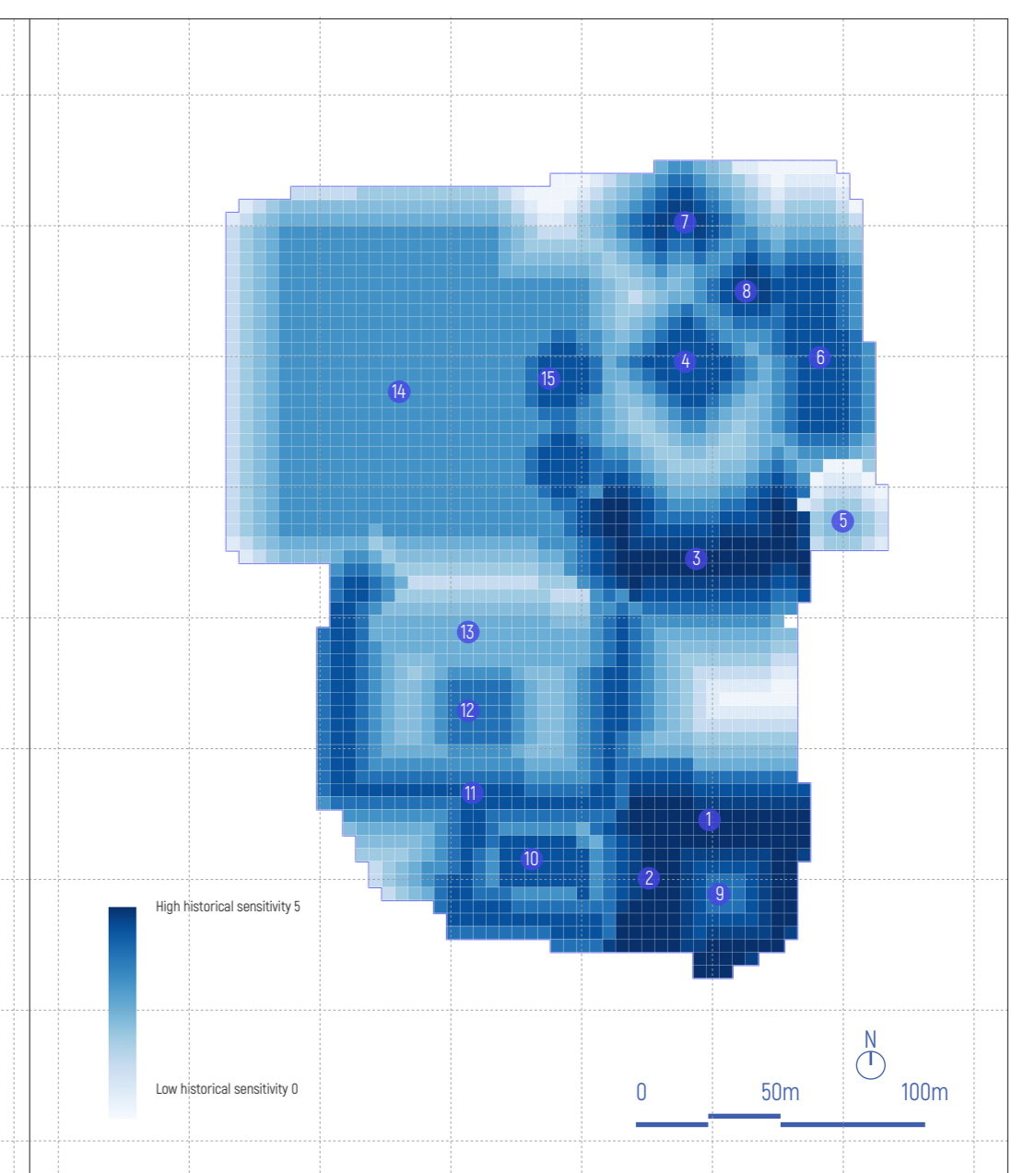


- 16th-century palace
- 18th-century palace
- Ninfeo
- Parterre and fountain of Galatea
- Water tower
- Italian garden
- Exedra-Ratto di proserpina
- Ginkgo
- Court
- Natural theatre
- Hornbeam gallery
- Parterre and fountain of Nettuno
- Greenhouses
- English garden
- Two cedars on the English garden

AWARENESS MAP



HISTORICAL SENSITIVITY MAP



RAISING AWARENESS OF THE HISTORICAL VALUES OF HISTORIC PUBLIC GARDENS: GUIDELINES TO PLAN COMPATIBLE USES AND ACTIVITIES IN HISTORIC GARDENS

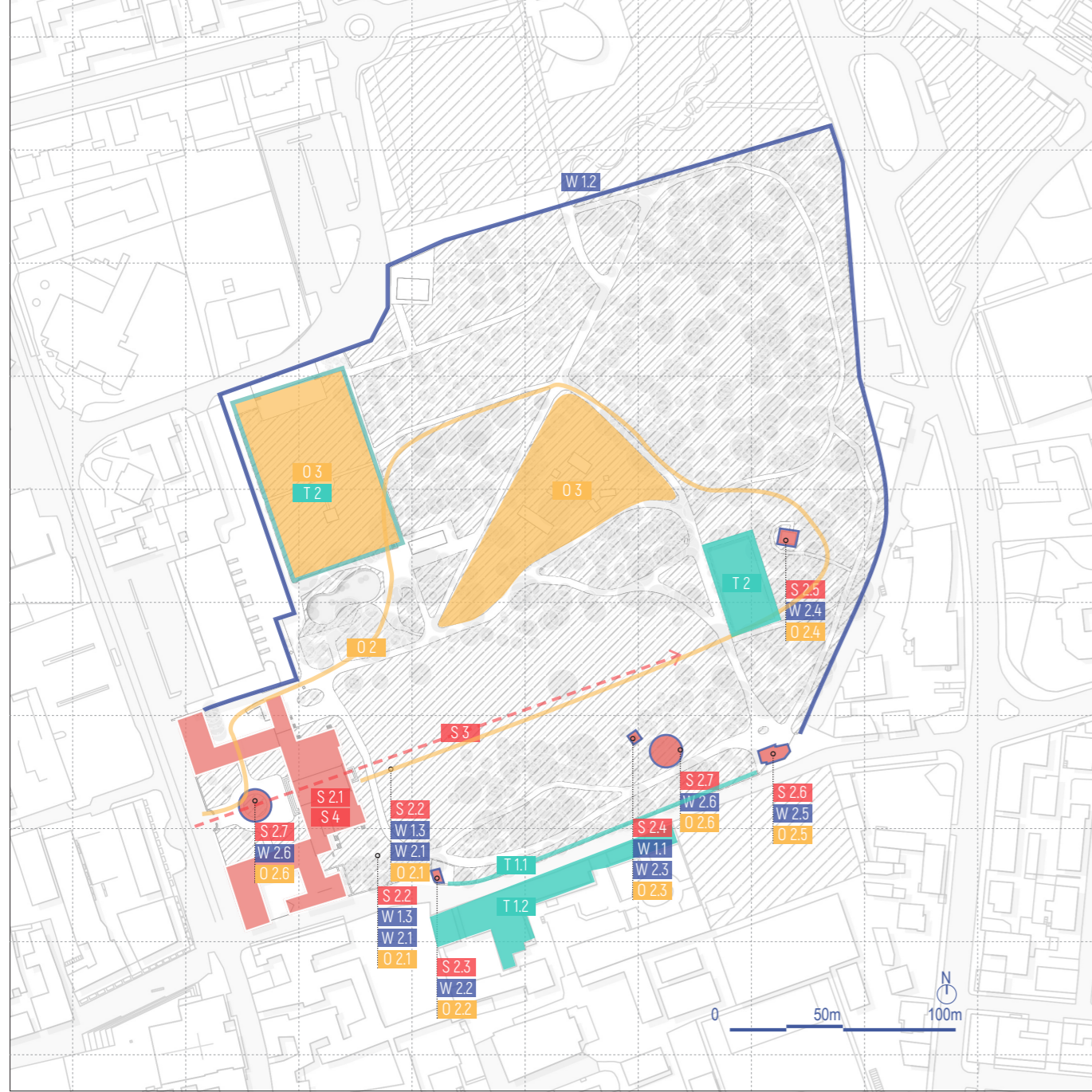
—THE CASES OF VILLA GHIRLANDA SILVA PARK IN CINISELLO BALSAMO AND VILLA BORROMEO LITTA PARK IN LAINATE

Politecnico di Milano
School of Architecture Urban Planning Construction Engineering
Master Degree in Landscape Architecture - Land Landscape Heritage
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Supervisor: Prof. Alberta Cazzani

05

SWOT ANALYSIS - Villa Ghirlanda Silva Park in Cinisello Balsamo

Historical and cultural aspect



S Not just in the Cinisellese region, but also throughout all of Lombardy, it is one of the most intriguing and well-preserved historical mansions which is free-open.
1.The architectural elements are well integrated with the landscape elements and the overall layout reflects the "palimpsest" character of the landscape since the 17th century
2. Rich historical elements
History and design characteristics of the villa can be seen in the many historical layouts and elements that have been preserved.
21 Villa 22 Sculptural remains 23 Esedra della Salute 24 Obelisk 25 Swiss Chalet and the Hill 26 Scottish Lodge 27 Monumental trees
3. Existing historical axis
The historical axis is still preserved in the present garden
4. Regeneration of Villa
Characteristics of the villa can enhance the park's cultural and natural experiences while also meeting modern needs.

W 1. Lack of maintenance
The historical monuments and walls are painted with graffiti, which seriously spoils the historical atmosphere of the villa. Some sculptures have not been well preserved.
11 Obelisk 12 Enclosures 13 Sculpture remains
2. Inadequate historical atmosphere
Many historical elements lack systematic identification. It is difficult for people to perceive their value directly and raising awareness of its historical values
21 Sculptural remains 22 Esedra della Salute 23 Obelisk 24 Swiss Chalet and the Hill 25 Scottish Lodge 26 Monumental trees
3. Lack of systematic tour planning

O 1. Enhancement of historical atmosphere
The historic garden has a strong historical value and the general core layout is preserved. Its historical atmosphere can be enhanced by low-cost interventions such as signage systems.
11 Sculptural remains 12 Esedra della Salute 13 Obelisk 14 Swiss Chalet and the Hill 15 Scottish Lodge 16 Monumental trees
2. The park itself retains the rich spatial variation of the English landscape gardens and can be developed by continuous paths that bring development and create an interesting and historically valuable spatial sequence, thus enhancing the historical awareness of visitors.
3. Because the Historic Garden is a free and open public green space, it can be integrated into the life of the surrounding community in a more active mode.
4. Because of its unique historical value, it has the potential to attract a wider range of visitors to the area.

T 1. Loss of character due to urbanization
The surrounding urban development has had a negative impact on the villa's environment, such as noise, as well as negative changes in the visual experience brought about by the high-rise buildings in the surrounding area, which are difficult to eliminate.
11 Enclosures in poor condition 12 Buildings affecting the visual experience
2. Changes in leisure methods
Changes of people's lifestyles have reduced the status of the garden in people's lives, for example, the original theater and dance floor areas are now significantly less vibrant.

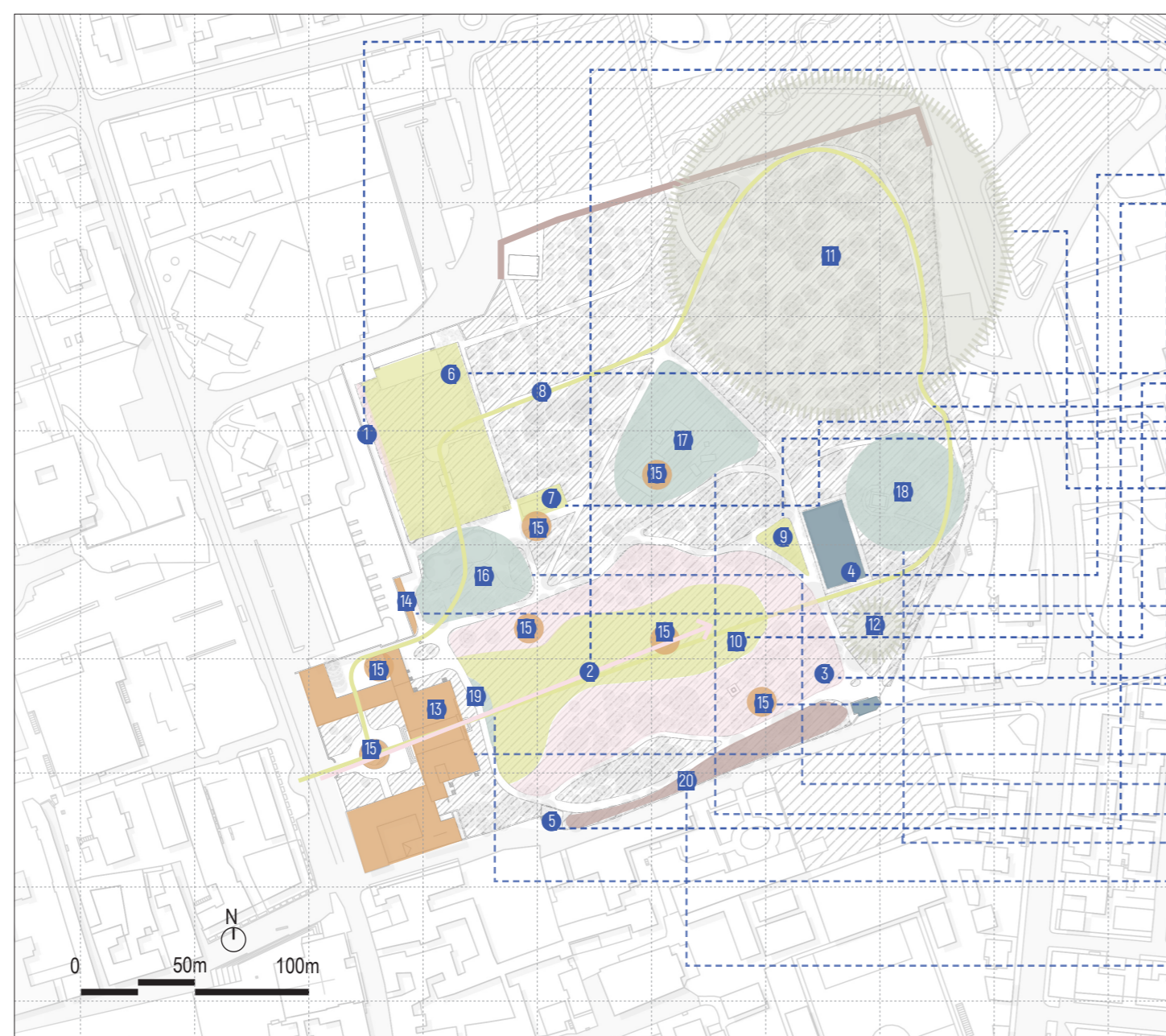
SWOT OVERALL ANALYSIS

S
Historical elements
Botanical resources
Unique Spatial Experience
Functional Potential

W
Insufficient historical atmosphere
Poorly maintained structures and plants
Functional degradation

O
Historical value reinforcement
Raising awareness of historic gardens among visitors
Location in the regional city

T
Changes in people's living patterns
People's demand for open green space functions
Negative effects of urbanization
Inputs for long-term management



- S** BORDER TREE LINE
MAIN AXIS
ENCLOSURE TREE GROUP
- W** DANCE FLOOR
SCENIC BUILDING
- O** OPEN CINEMA
SMALL PLAZA
POTENTIAL SEQUENCE
FLOWERING BED
BIG LAWN
- T** NORTH WOODLAND
UNHEALTHY TREE
- S+O** VILLA
BAR
MONUMENTAL TREE
- S+O** POND
PLAYGROUND
SWISS CHALET AND THE HILL
FLOWERING BED
- S+T** NORTH EDGE

GUIDELINE- BASED STRATEGIES

Strategies about awareness

Health Exedra
Re-design the site as a resting area.

Ruins & Sculptural remnants
Keep the relics in their present condition and set interpretation signs to provide information.

Pond
Transform the pond into an activity area and introduce the element of dry spray fountain.

Strategies about activities

Open-air cinema
As a place to hold events, with movable seatings.

Bar
The bar is of no design and the noise generated by people gathering here may affect other visitors. Transfer the bar to the Swiss Chalet.

Plant Belt
Noise insulation of activity sites to reduce the impact on historically sensitive areas.

Strategies about infrastructure

Playground
Remove the materials and infrastructure out of harmony with its surroundings. Reduce the impact of activities on the protected trees here.



Strategies about awareness

Woody area
Set a botanical trail in the woody area, providing scientific information.

The Swiss Chalet
Restore the building and reuse it as a bar.

Skating rink
Relocation of former playground to less historically sensitive sites.

Strategies about activities

Walking dog
Relocation of activities such as dog walking that would damage the historic value of the garden to the external public green space.

Playground
Eliminate hard surfaces that can harm the root systems of monumental trees.

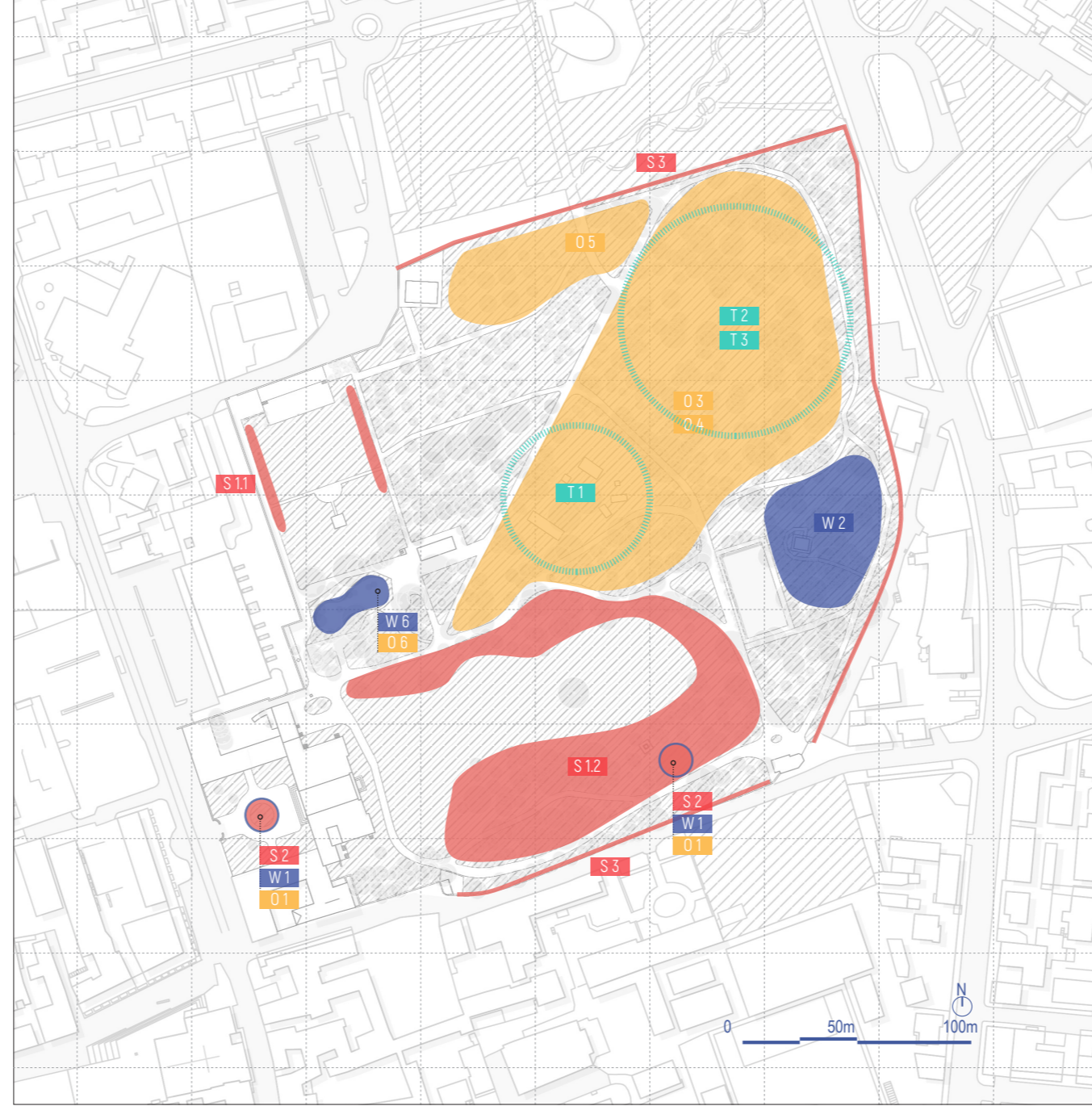
Plant Belt
Noise insulation of activity sites to reduce the impact on historically sensitive areas.

Music Square
Functionally degraded area for catering.

Strategies about infrastructure

Skating rink
Extensive hard surfaces are out of harmony with the surroundings and alterations.

Natural and ecological aspect



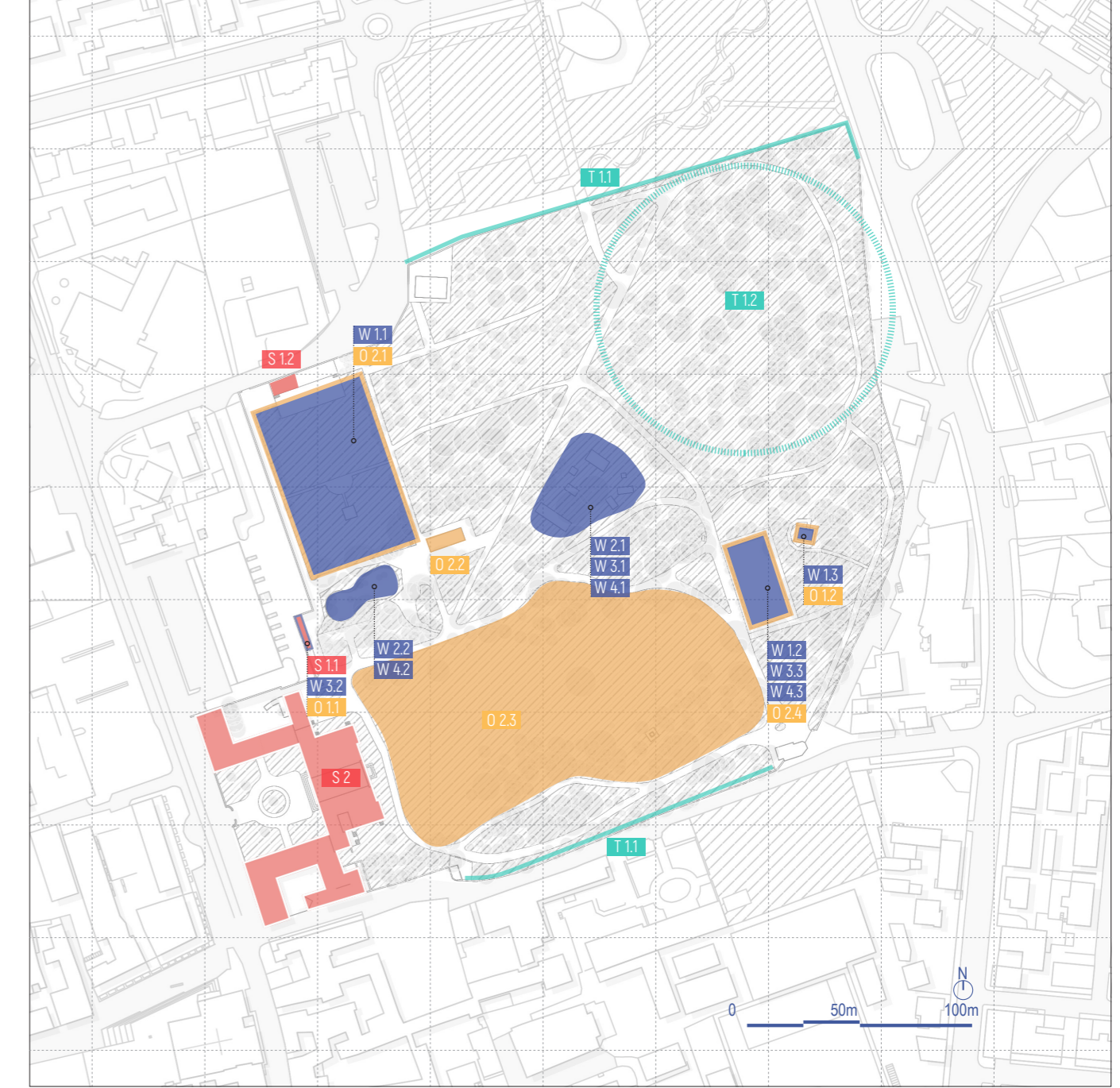
S 1. Shaping the spatial character
The variety and shape of the plants in the garden shape the spatial variation of the garden.
1.1 Sequence of trees 1.2 Plant belts that divide the space
2. Shaping the sense of history
Tall trees, especially monumental trees, enhance the historical atmosphere of the garden.
3. Reduce the influence of the city on the atmosphere of the garden, such as reducing the noise from the city and the visual impact of the taller surrounding buildings
4. To provide habitat for the animals and birds of the region and to protect the biodiversity of the region
5. Improve the physical environment of the garden in general, such as providing shade and improving air quality

W 1. Lack of educational signs that present information about the history of monumental trees
2. Some plants are overgrown and lack pruning maintenance, obstructing landscape views and pathways
3. Many plants are in poor health and are infested with vines and fungi
4. Toxic tree species Taxus baccata and Wisteria sinensis can be problematic in the garden when children and others ingest their seeds.
5. Shrub level plants are monotonous
6. Water body areas dried up and abandoned

O 1. Enhanced signage presentation of monumental trees
2. Abundant plants to educate the public on plant awareness and playful experiences
3. Possible inclusion of new functional nodes in a comfortable plant space, such as under a tree
4. Enhance plant richness
Some areas could add more types and levels of ornamental plants
5. Hierarchy of trees and shrubs to provide sight lines and directional guidance for users
6. Modification of the water space can create an attractive space

T 1. Some plants are at risk of limb or trunk tipping due to poor management or non-compliance.
2. The presence of invasive species
3. Overly dense woods pose some safety risks and spatial aesthetic fatigue
4. more visitors bring more potential damage to plants
5. The growth of automobiles and urban industries has had a negative impact on the garden's environment.
6. Climate change and increased weather extremes pose a threat to the vegetation in the garden.

Social and economic aspect



S 1. Adequate basic services
Although it is a historic garden, it assumes the function of a public green space, and a series of basic services have been added to the park to enable visitors to have a longer visit experience.
1.1 Bar 1.2 Toilet
2. The rich experiential possibilities offered by the villas
The gardens are closely related to the villas, and museums and other features set within the villas can make it possible for people to have a richer experiences.

W 1. Functional degradation
Some spatial areas or set structures have degraded or even lost their functions due to the change of people's lifestyles.
1.1 Open-air cinema 1.2 Dance area 1.3 Swiss Chalet and the Hill
2. Poor maintenance
Facilities are often poorly maintained and require significant and ongoing funding to maintain.
2.1 Playgrounds 2.2 Pools
3. Poor design
Some landscape structures and facilities lack design-level consideration and are disconnected from the historic character of the park.
3.1 Playground 3.2 Bar 3.3 Dance area
4. Low user satisfaction
After research, the activity space does not meet visitors' expectations
4.1 Playground 4.2 Pool 4.3 Dance area

O 1. Some features have profit potential
People are willing to make some basic purchases after park activities, even if these costs are higher in the park. Currently, the only bar is popular with visitors.
1.1 Bar 1.2 Swiss Chalet and the Hill
2. The possibility of holding large events
The park has some importance in the lives of the surrounding residents, and it has a closer spatial relationship. Therefore, there is a possibility of to hold large events and festivals.
2.1 Open-air cinema 2.2 Small square 2.3 Meadow 2.4 Dance area

T 1. Management difficulties
The management of the park is inadequate, and some facilities and even monuments have been artificially. The northeastern densely wooded area poses certain security risks.
1.1 Broken enclosure 1.2 Overly dense woods that give a sense of insecurity.
2. Coordination issues between different stakeholders
3. Intensification of new functions and residential activities may affect the natural and historical-cultural atmosphere of the park

GUIDELINES RELATED TO STRATEGIES FOR VILLA GHIRLANDA SILVA PARK

How to make people aware of the heritage in the historic public gardens?

- Install guide maps and self-service information stands at the entrances to the historic public gardens to provide visitors with handy maps, introductory brochures, and interpretive machines.
- Set up interpretive signs next to significant historic sites and protected tree species to provide relevant historical and cultural or vegetation information. Signs can be arranged in conjunction with pictures, and displaying historical photos is a good option for historical elements with significant changes.
- Use barriers and warning signs around some of the heritages and protected vegetation to remind visitors of the importance of these elements. Barriers can be replaced by vegetation as a natural partition.

How to enhance the connection between historical elements?

- Study damaged and missing historic sites and restore, renovate, or preserve them in their current location and condition.
- Organize existing and restored sites and new cultural tours to give visitors a complete experience of the history of the historic public garden.
- The restoration and renovation should follow historical information and try to restore the original appearance of the elements without making any content that is not in line with the history and culture. The restored elements should be marked as replicas so visitors can clearly distinguish them. On the contrary, it would be more appropriate to keep the status quo than restorative for some of the ruins, and the ruins would give visitors a different feeling.

What to do with abandoned facilities in historic public gardens?

- Determine whether to restore the use of the facility, preserve it as a relic, or remove the broken facility, taking into account the degree of damage, the surrounding environment, and the possibility of restoring it to use.
- For facilities that can be restored to use, first consider the original function of the facility and then consider renovation for other functions. The renovation of old facilities should take into account the overall environment and not add anything that is not relevant or harmonious to the historic garden.
- Reuse the abandoned facilities in conjunction with some of the activities that once existed in the historic garden to recreate the old look of the garden.
- Revegetation can also recreate the landscape structure of the historic garden, for example, by reopening views through woodlands; replanting boulevards; restoring paths with specific scenarios.

How can visitors participate in the management of historic public gardens?

- Install comment boards and suggestion boxes at the entrances and exits of the historic public gardens to encourage visitors to provide what needs to be added to the conservation and management of the gardens.
- Organize regular participant meetings with the surrounding public to summarize the opinions of the garden visitors in workshops.
- Call on the public to volunteer in historic public gardens and participate in the conservation and management of public gardens. From there, suggestions from the perspectives of different participants can be obtained. Villa Litta, for example, has a special volunteer association that includes people from different backgrounds, including students, surrounding residents and social workers. In the process of managing the garden together, each person offers different help to the garden due to their different backgrounds, some for the conservation of the relics, some for the maintenance of the vegetation, and some for the organization of events. Thus, they could give advice in different aspects.

How to deal with inappropriate hard pavings in public historic gardens?

- Depending on the condition of the ground in the different areas of the historic public garden, remove all ground materials that do not fit the environment, such as concrete and rubber.
- Replace the ground material with the same paving or soil, taking care not to harm the surrounding vegetation.
- For some areas where the ground is severely damaged, the restoration process can use vegetation to form an ecological barrier to limit the entry of visitors. For instance, shrub belts or flower beds are a good choice to be a barrier. In Villa Litta, hydrangea bushes are used to separate the public areas from the paid areas, which also creates an impressive view.

How to properly arrange facilities in historic public gardens without affecting the heritage as much as possible?

- Integrate the zoning considerations of the historic gardens and locate the service facilities outside the sensitive areas of the gardens so that the activities do not interfere with the sensitive areas.
- Considering the concentration of people in sensitive areas, the service facilities should not be too far from the main building and the central area of the garden, but not directly adjacent to it.
- Consider using the redundant cabins in the garden for structural facilities, such as restaurants and stores. Try to avoid building new structures within the historic gardens.

How to properly install facilities in a historic public garden?

- When installing infrastructure, avoid protecting the root zone of trees and avoid the main areas of wildlife activity.
- Use eco-friendly materials impacts, such as stone and wood and try not to use materials that may pollute the environment. If possible, use materials from the site that can be reused, such as discarded tree stumps. Alternatively, use locally sourced materials to avoid additional energy loss from material transportation.
- Handle earthworks carefully during construction, avoiding large-scale earth movement for renovation and minimizing the scope of construction used to reduce the environmental impact.

How to arrange the facilities appropriately?

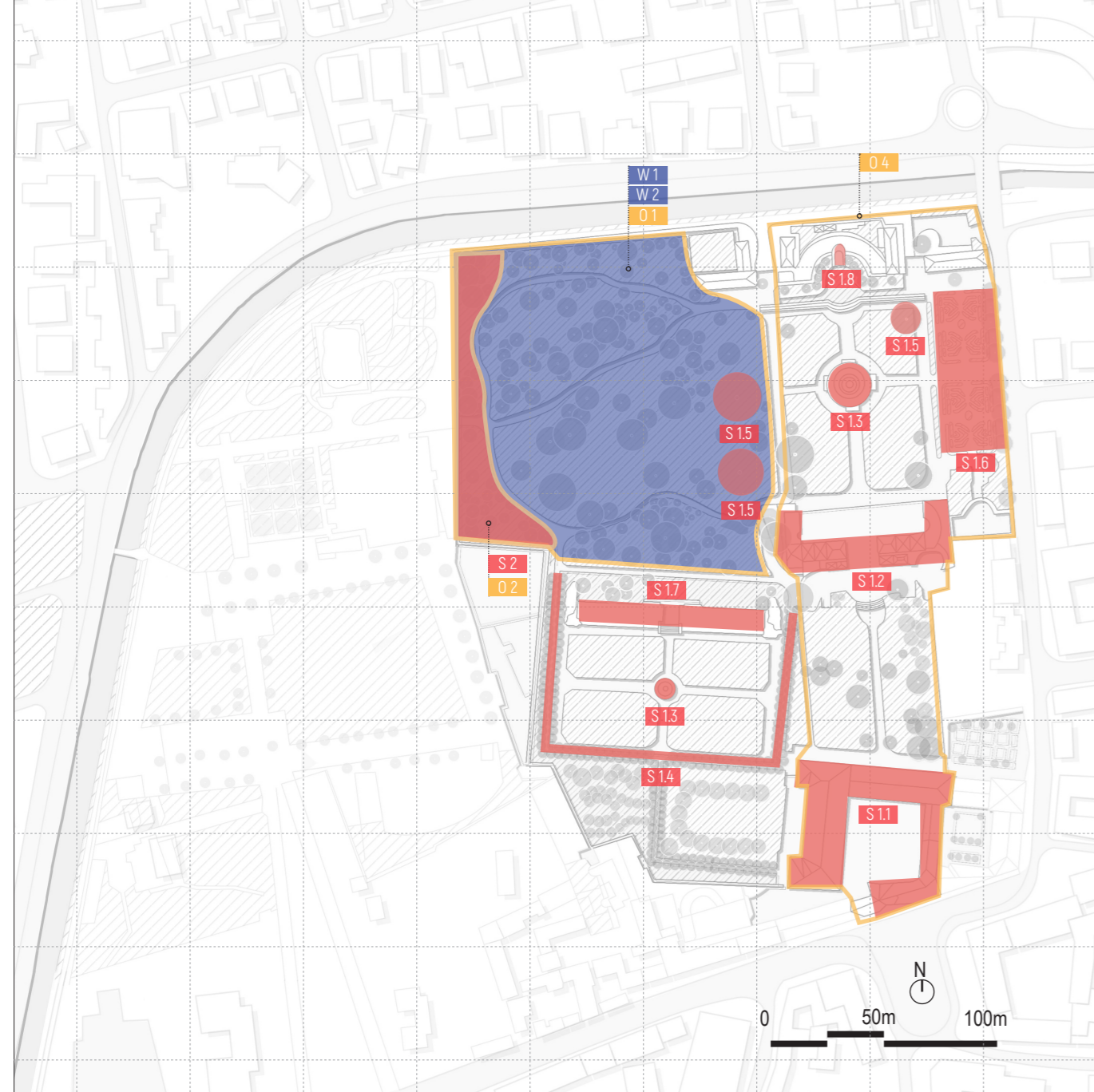
- The infrastructure should lay out more rationally, considering the spatial structure of the historic garden, the pathway system, the visual relationship, and the composition of the vegetation. In particular, seating and signage are visitors' two most frequently used facilities. Signage should be placed at road connections, while seating should take into account the distribution of historic landscape elements and activity sites along the visitor tour route and in the surrounding area. For example, seating should be placed near event sites and viewpoints, which are the places where visitors will focus their time.

RAISING AWARENESS OF THE HISTORICAL VALUES OF HISTORIC PUBLIC GARDENS: GUIDELINES TO PLAN COMPATIBLE USES AND ACTIVITIES IN HISTORIC GARDENS

—THE CASES OF VILLA GHIRLANDA SILVA PARK IN CINISELLO BALSAMO AND VILLA BORROMEO LITTA PARK IN LAINATE

SWOT ANALYSIS - VILLA BORROMEO LITTA PARK IN LAINATE

Historical and cultural aspect



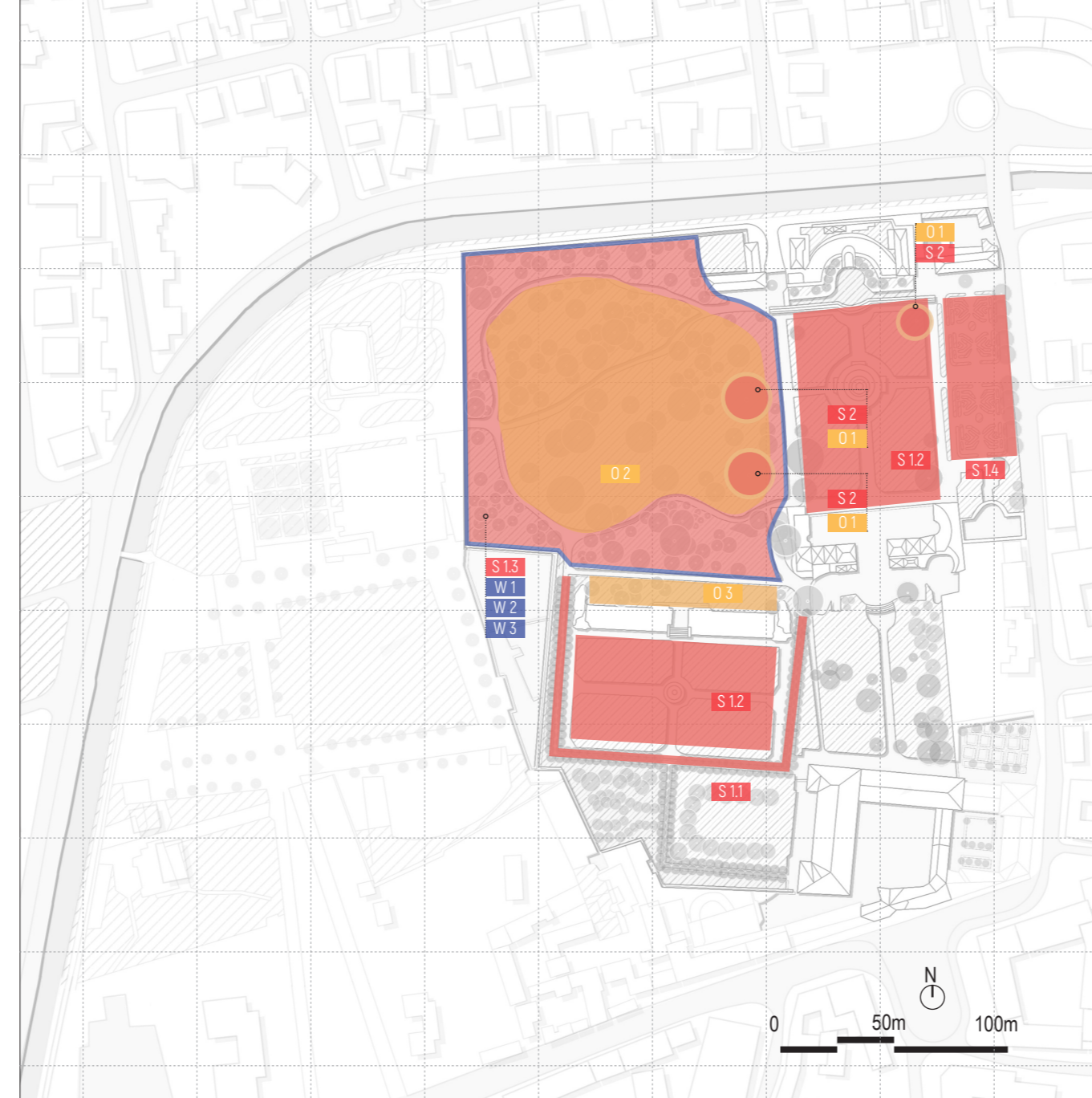
- S**
- The garden has well-preserved historical elements and layout. This can reflect the history and design features of the garden to some extent.
 - 1.1 The villa 1.2 Ninfeo 1.3 Fountain 1.4 Hornbeam gallery 1.5 Monumental trees 1.6 Italian garden 1.7 Greenhouses 1.8 Exedra-Ratto di prosperina
 2. The existing informal garden partially retains the ground level variation and the large number of trees from the original design, demonstrating to some extent the spatial layout of the original English garden.
 3. Most of the historic sites are well maintained, especially in the conservation area.
 4. The garden has a comprehensive touring system with clear and readable guide signs with guided tours throughout the visits in the conservation area.

- W**
- The historical atmosphere of the free-open area is not sufficient. Since it is a free open section, it is difficult for visitors to feel the historicity in the public part without historical construction, especially in comparison with the paid conservation area.
 2. The historic plan layout is almost completely lost in the English garden section, although some of the vertical height difference is retained.

- O**
- Enhance the historical atmosphere
 - The park has a strong historical value, and its significant historical heritage has been preserved. Specific interventions can enhance its historical atmosphere.
 - The park itself retains interesting vertical spatial variations that can be created to some extent to create an interesting and historically valuable public activity space.
 - Because of its free and open nature, it can be integrated into the life of the surrounding community in a more positive way.
 - The conservation part of Villa Litta is a famous historic garden of high unique historical value in Lainate, and it has the potential to attract more visitors to the area.

- T**
- The demand for the use of the garden as an open green space by surrounding visitors has a negative impact on the historical value of the garden itself, such as the destruction of ground cover by activities such as dog walking and cycling.

Natural and ecological aspect



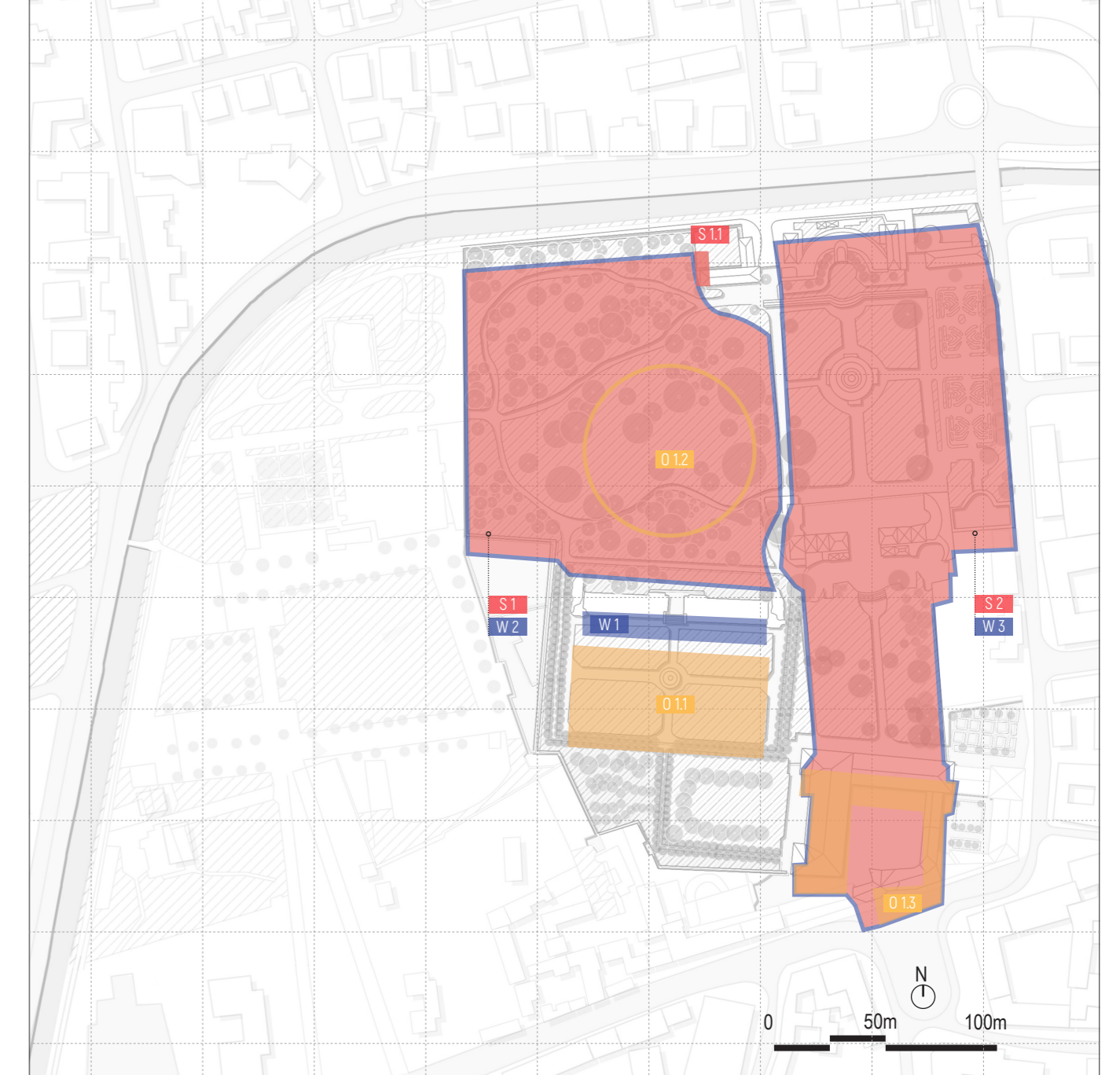
- S**
- Shaping the spatial character
 - 1.1 The hornbeam gallery is the longest scenographic natural path in Europe. 1.2 Baroque Garden 1.3 Informal Garden 1.4 Italian garden
 2. Shaping the sense of history
 - Tall trees, especially monumental trees, enhance the historical atmosphere of the garden.
 3. Reduce the influence of the city on the atmosphere of the garden, such as reducing the noise from the city and the visual impact of the taller surrounding buildings
 4. To provide habitat for the animals and birds of the region and to protect the biodiversity of the region
 5. Improve the physical environment of the garden in general, such as providing shade and improving air quality

- W**
- The ground cover layer is degraded and in poor condition due to human activities and other reasons.
 - The informal garden shrub layer in the English garden is missing and has a weak ability to divide the garden space.
 - Toxic tree species *Taxus baccata* can be problematic in the garden when children and others ingest their seeds.

- O**
- There are a large number of plants with historical value to carry out a variety of educational activities which can increase public awareness and experience of plants.
 - The addition of a hierarchy of trees and shrubs can provide sight lines and directional guidance for users.
 - Enhance plant richness
 - Some areas could add more types and levels of ornamental plants.

- T**
- More visitors may bring more potential damage to plants.
 - The growth of automobiles and urban industries has had a negative impact on the garden's environment.
 - Climate change and increased weather extremes pose a threat to the vegetation in the garden.

Social and economic aspect



- S**
- Basic services
 - Although it is a historic garden, it assumes the function of a public green space and adequate infrastructure exists for the garden.
 - 1.1 Toilets 1.2 Benches 1.3 Trash cans 1.4 Water supply points
 2. The conservation area is a fee-paying open area with revenue funds for routine maintenance of the historic gardens.

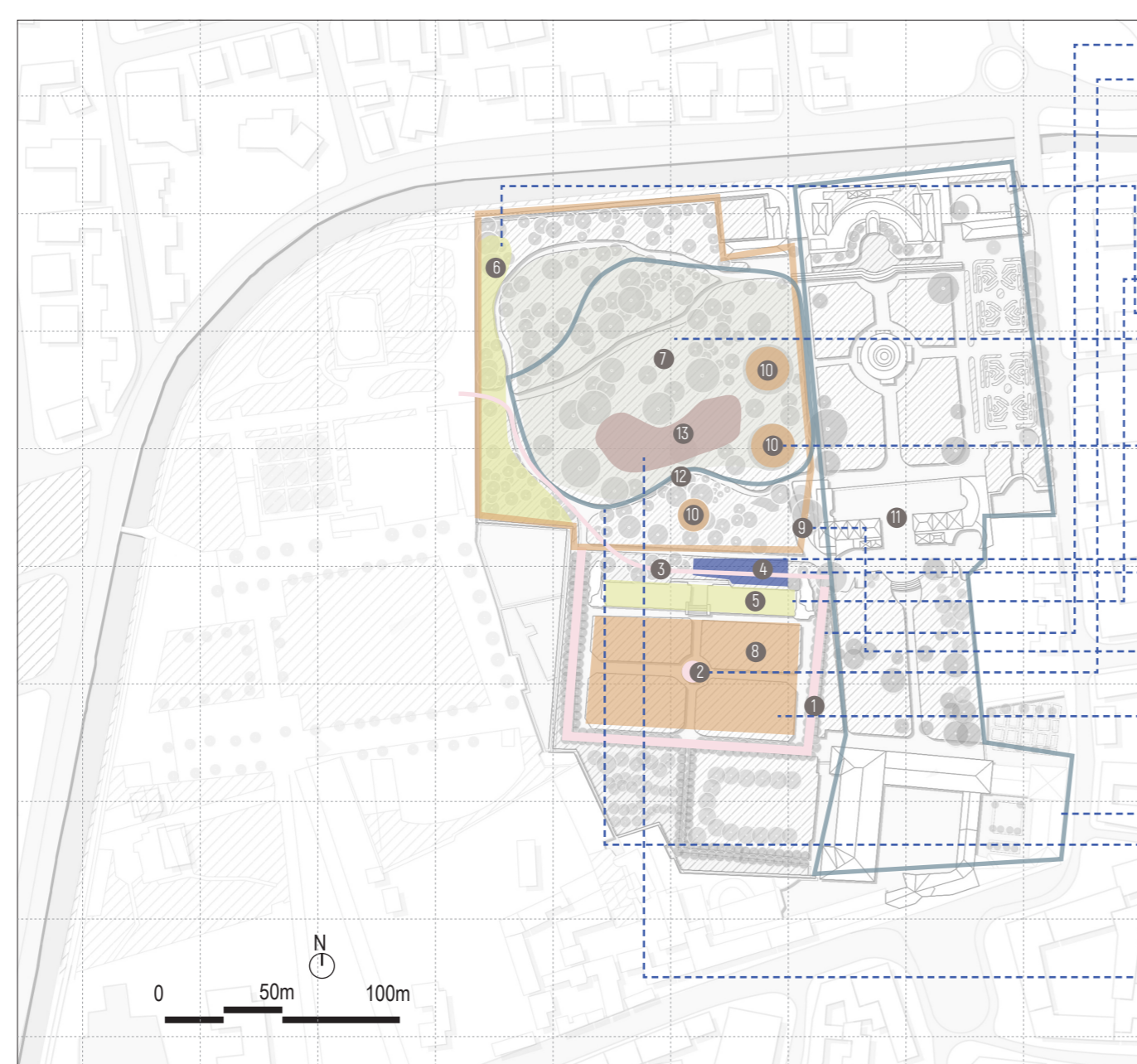
- W**
- Areas such as greenhouses, where a certain level of attractiveness exists, are not open to visitors.
 - No special design
 - Some landscape structures and facilities lack design-level consideration and are disconnected from the historic character of the garden.
 - 2.1 Benches 2.2 Trash cans
 3. The two artificially divided areas are less connected and visitors hardly aware the fact that they are part of the same historic garden, making the visit incomplete.

- O**
- Possibility of holding events
 - The garden has great significance in the life of the surrounding residents and it has a relatively close spatial relationship. Moreover, it usually cooperate with other associations to hold some events.
 - 1.1 Baroque Garden 1.2 Informal garden 1.3 The villa

- T**
- Management difficulties
 - Because of the free access, it is difficult to rigidly control the behaviors of visitors in the garden.
 - Coordination issues between different stakeholders.
 - Intensification of new functions and activities may affect the natural and historical-cultural atmosphere of the garden.

SWOT OVERALL ANALYSIS

- S**
- Botanical resources
 - Historical elements
 - Unique Spatial Experience
 - Effective tour guide system
- W**
- Insufficient historical atmosphere
 - Shrub and ground cover degradation
 - Historical structure and layout lost
 - Poor infrastructure layout
- O**
- Enhancing the historical atmosphere
 - Raising awareness of historic gardens among visitors
 - Reinventing historical space
 - Location in the regional city
- T**
- People's demand for open green space functions
 - Differences in historical value from non-free open areas
 - Management difficulties
 - Negative effects of urbanization



- S**
- 1 U-shaped Tree Gallery
 - 2 Neptune Fountain
 - 3 Signage
- W**
- 4 the Derelict Lawn
- O**
- 5 Greenhouse
 - 6 Grassland with height variation
- T**
- 7 Shrub layer absent
- S+O**
- 8 Baroque Garden
 - 9 Informal garden
 - 10 Monumental trees
- W+O**
- 11 Non-free open area
 - 12 Infrastructural facilities
- S+T**
- 13 Central lawns

GUIDELINES RELATED TO STRATEGIES FOR VILLA LITTA

- How to make people aware of the heritage in the historic public gardens?**
- Install guide maps and self-service information stands at the entrances to the historic public gardens to provide visitors with handy maps, introductory brochures, and interpretive machines.
 - Set up interpretive signs next to significant historic sites and protected tree species to provide relevant historical and cultural or vegetation information. Signs can be arranged in conjunction with pictures, and displaying historical photos is a good option for historical elements with significant changes.
 - Use barriers and warning signs around some of the heritages and protected vegetation to remind visitors of the importance of these elements. Barriers can be replaced by vegetation as a natural partition.

- How to choose suitable facilities for public historic gardens?**
- Design the infrastructure, mainly benches, and lamps, by referring to the historical images of the historic garden and selecting the available elements.
 - For equipment of children's activity area, first, think about what kind of children's activities are more suitable here, considering the garden's characteristics and culture. Then design or select the appropriate facilities according to the activities rather than placing off-the-shelf equipment in the gardens.
 - Choose specific locations for children's activities, taking into account the characteristics and culture of the historic gardens rather than placing off-the-shelf equipment in the gardens.

- How to properly hold events in historic gardens?**
- Avoid sensitive areas of the historic public gardens, protected tree areas, and major wildlife areas as much as possible to reduce the environmental impact of crowds.
 - The equipment used for events should be temporary, lightweight structures to minimize the impact of the equipment on the historic garden's floor. It is best to use assembled facilities, which is quicker and easier to set up and take down.
 - For example, lightweight materials can be used for markets or concerns to build structures and movable seats that can be removed in time for the event to end.
 - Follow the regulations for events.
 - Although Events can gather large numbers, the number of people gathered should be limited to varying degrees for historic gardens of different sizes.
 - Events are generally located in the least sensitive, open areas of the historic garden, thus minimizing their impact on the historic garden.
 - The temporary structures used for events should be environmentally friendly, lightweight, and easy to assemble and disassemble. Materials should be transported away from paved areas to minimize damage to paved areas.
 - The sound of the event should also be controlled as much as possible; just enough to be heard by the people on site, not loud to reach the entire garden.
 - Only a mobile public address system, brought into the park and removed on the same day and audible only to those participating, will be allowed.

- What kind of materials are suitable for the facilities of historic public gardens?**
- The first step is determining if the facility's materials suit the historic garden. Brightly colored plastic, rubber, or other modern materials are not suitable for the core area of the historic garden. For example, in Villa Ghirlanda Silva Park, plastic seats are abrupt near the villa and central lawn. So the material used for the seats here is wood. Nevertheless, in less historically sensitive areas, such as the open-air cinema, removable plastic chairs are a good choice. Also, it should be in mind to choose mild colors.
 - It is necessary to select facilities that are consistent with the style of the garden, taking into account the characteristics of the historic garden and extracting essential features from the buildings or historic sites of the historic garden.
 - Alternatively, choose ecologically appropriate facilities, such as large stones or abandoned tree trunks on the site, and reuse them as benches.

- How to deal with the waste generated when feeding wildlife?**
- Install fixed-point feeding devices in historic public gardens, under trees, in bushes, or along paths to focus on feeding wildlife.
 - Design different types of feeding devices in different locations for different wildlife, for example, a feeding box in a bush for rabbits and a feeding box hanging from a tree for squirrels.
 - A device for recycling fruit shells at the feeding device reminds people to take care of the environment, and at the same time, these shells can be collected centrally and disposed of as fertilizer in the garden.

- How to combine children's activities with the culture of the historic garden?**
- If there were playful garden facilities in the historic garden, consider the feasibility of implementing them in the site context. If conditions permit, old play strategies can be recreated in the garden. Examples include garden mazes and water games, which balance playfulness with historical culture.

- How to enhance the connection between historical elements?**
- Study damaged and missing historic sites and restore, renovate, or preserve them in their current location and condition.
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GUIDELINE-BASED STRATEGIES

Strategies about awareness

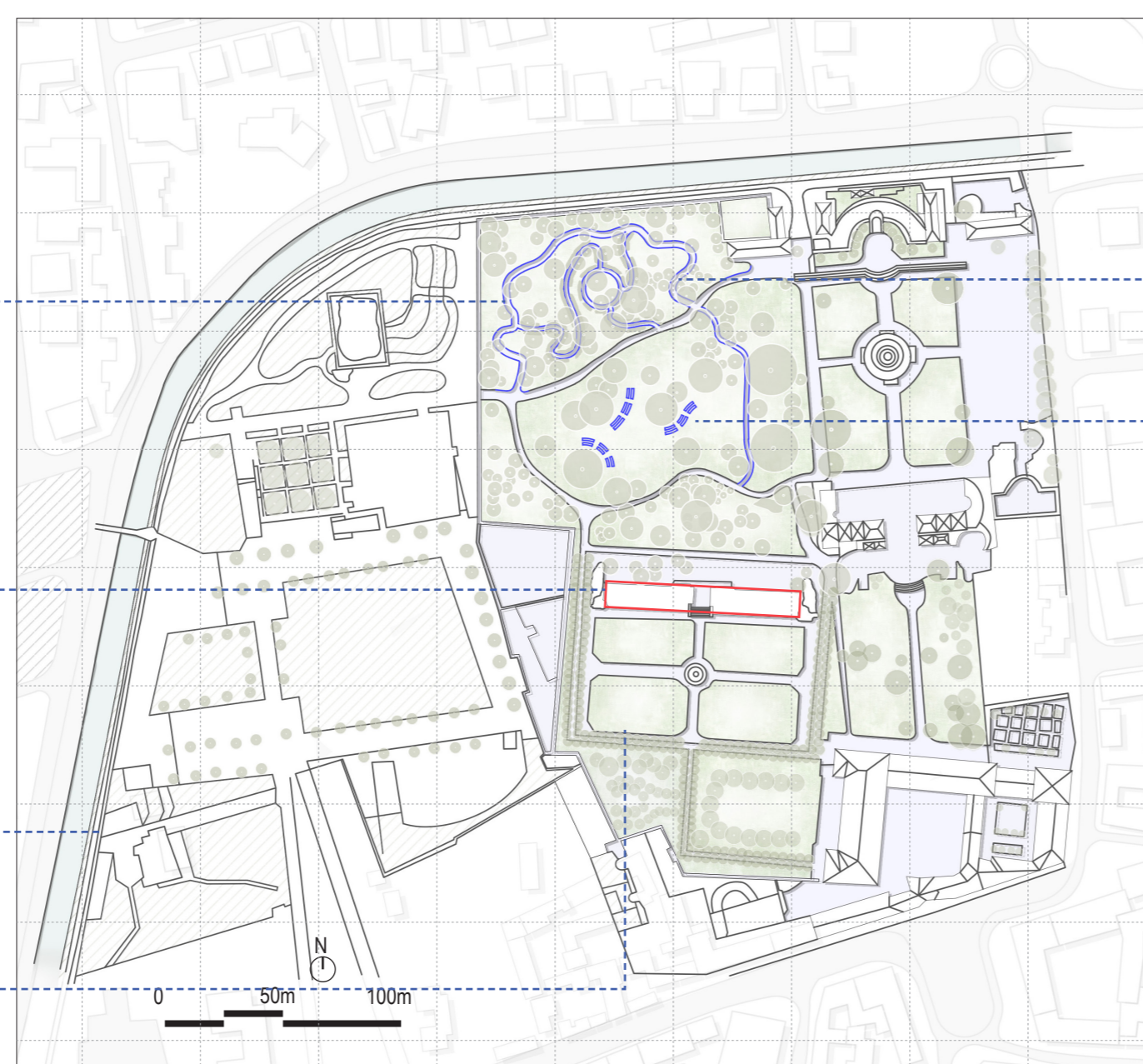
English garden
According to historical maps, recreate part of the old layout.

Greenhouses
Educational activities such as exhibitions and lectures can be organized in conjunction with the valuable tropical plant species in the greenhouse.

Strategies about activities

Walking dog
Dog activities may damage the historic value of the garden and effect the wildlife in the garden. It is advisable to walking dogs in the external public green space along the river.

Events
Temporary and assembled facilities can reduce the impact of events.



Strategies about infrastructure

Children's activity area
Introduce shrubs to separate spaces to create an interesting garden maze.

The lawn
Movable seats make it more convenient for people to choose where they want to stay.



"The Sustainable Development Goals (SDGs), otherwise known as the Global Goals, are a universal call to action to end poverty, protect the planet and ensure that all people enjoy peace and prosperity."

<https://www.herepowerstep.com/>

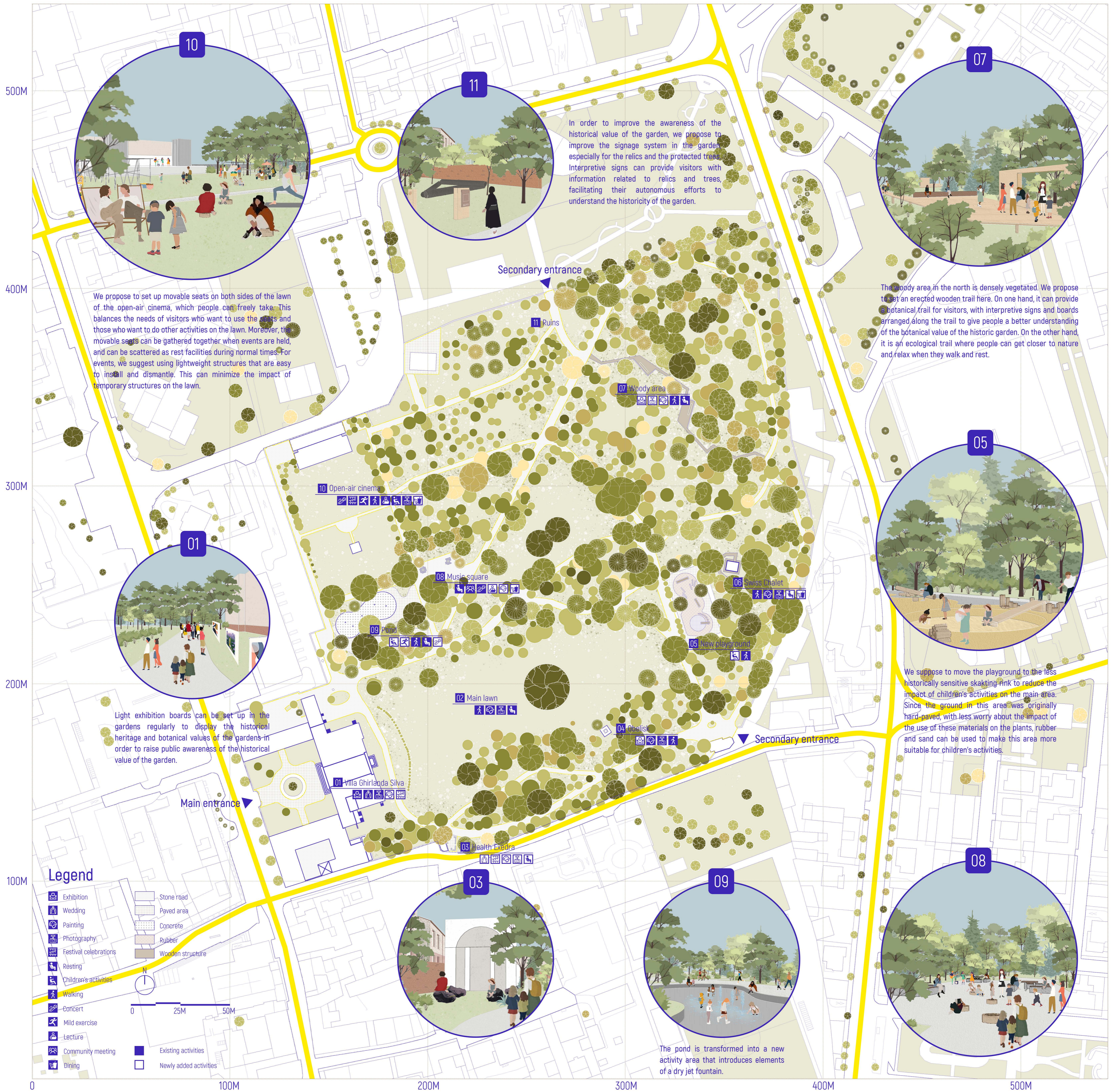
- Goal 4: Quality Education**
Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all.
- Goal 11: Sustainable Cities and Communities**
Make cities and human settlements inclusive, safe, resilient and sustainable.

- Goal 15: Life on Land**
Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss.

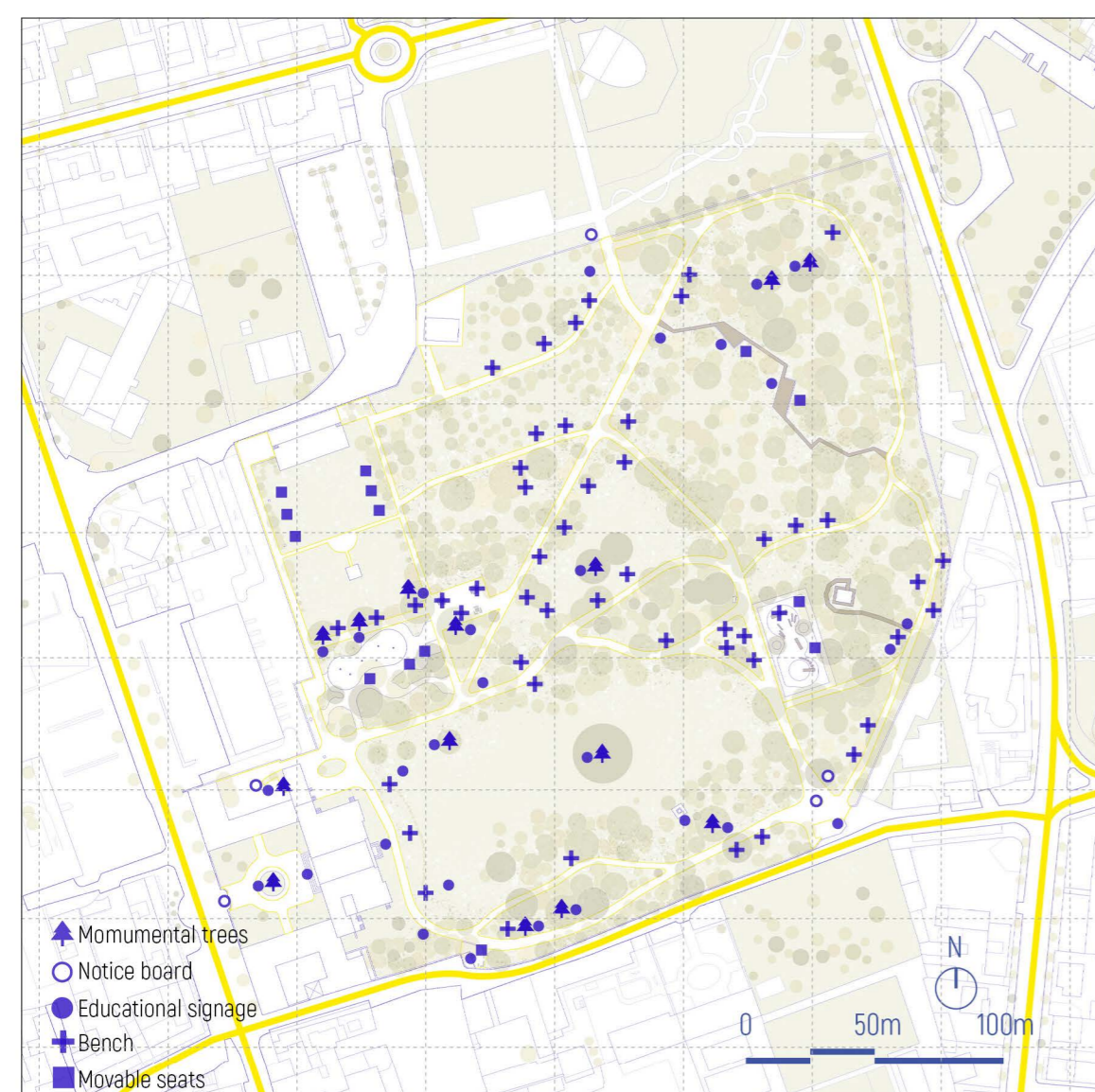
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MASTERPLAN - VILLA GHIRLANDA SILVA PARK IN CINISELLO 1:1000



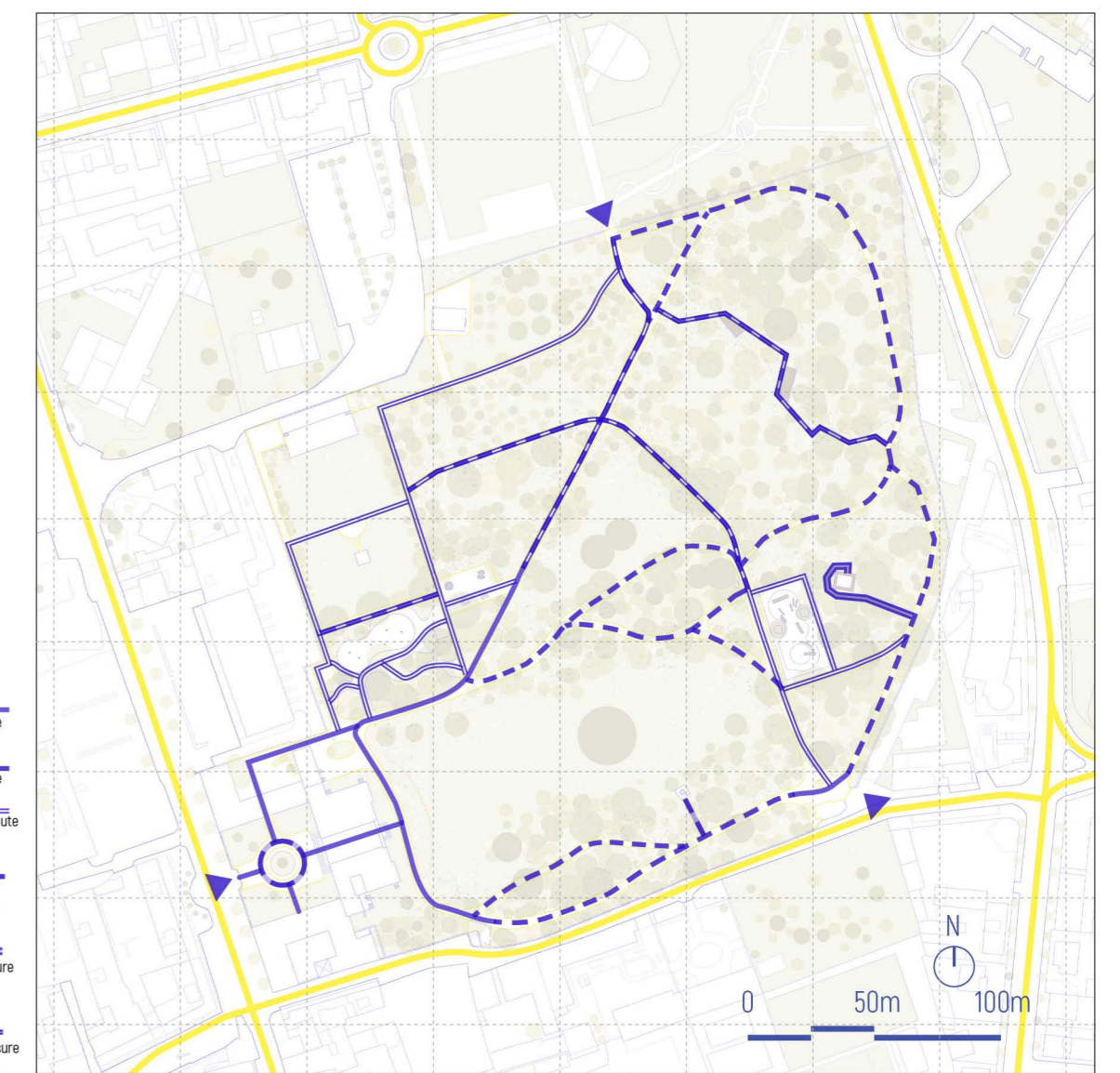
FEATURES



SPATIAL PERCEPTION AND SIGHT ANALYSIS



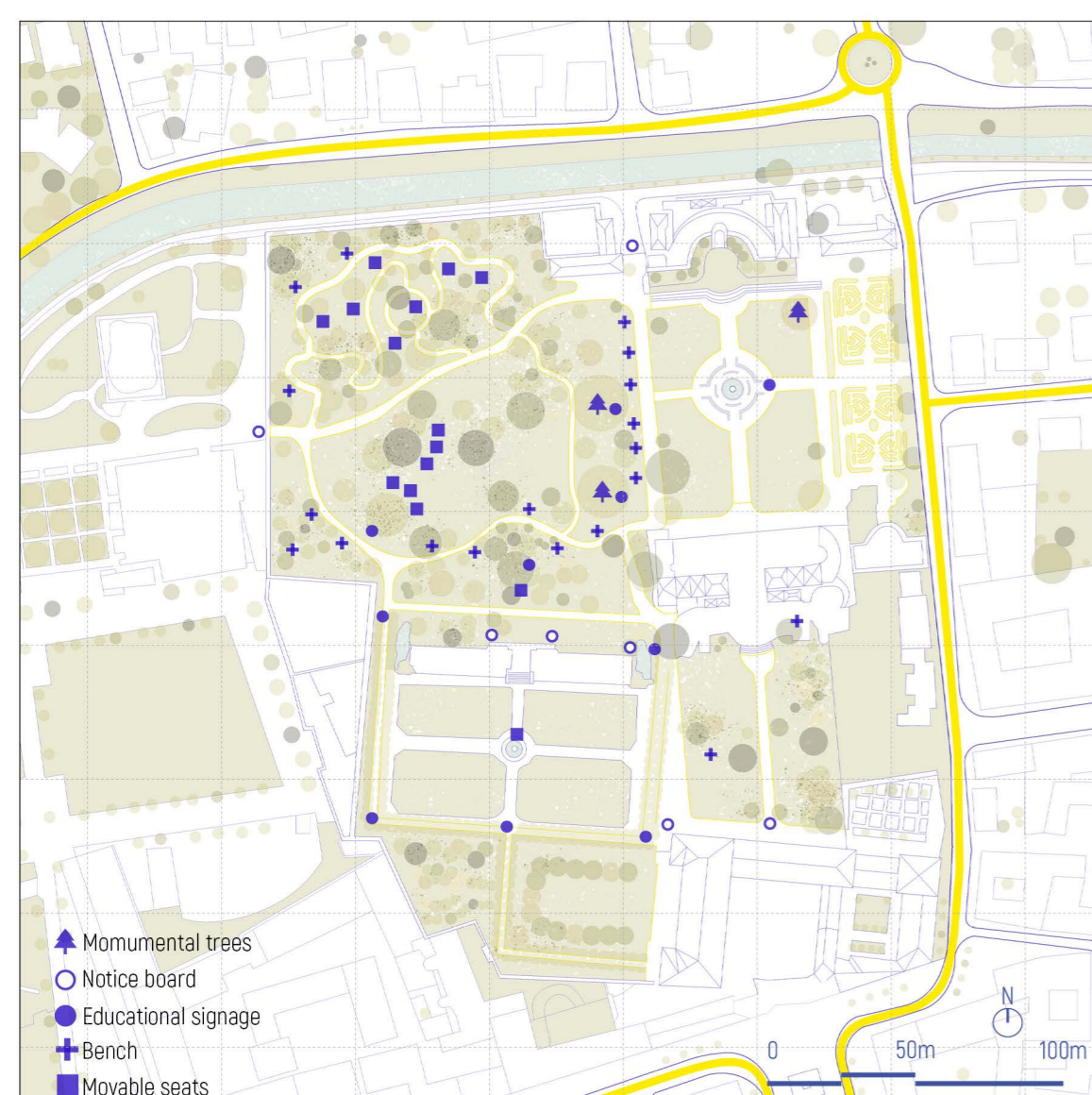
PROPOSED TOUR ROUTES



MASTERPLAN - VILLA LITTA LAINATE 1:500



FEATURES



SPATIAL PERCEPTION AND SIGHT ANALYSIS



PROPOSED TOUR ROUTES

