

UNIVERSITY OF NOVA GORICA
GRADUATE SCHOOL

**THE CONSERVATION OF
HISTORIC URBAN LANDSCAPES: AN APPROACH**

Vol. 2 - The methodological approach

DISSERTATION

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**THE CONSERVATION OF HISTORIC URBAN LANDSCAPES:
AN APPROACH**

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VOL. 2

THE METHODOLOGICAL APPROACH

15. GENERAL METHODOLOGY OF THE RESEARCH

15.1. Introduction

The aim of the research is to define a methodological approach to the planning and integrated conservation of Historic Urban Landscapes, HUL.

As a point of departure and essential basis for the philosophy upholding HUL, this approach is based on the need to consider the **city as a single entity**, with due attention to the fact that historic cities are often characterised by their diversity reflecting the long-standing stratification processes. Within the resulting HUL, each part can be seen related to the others and forming the whole, in reference to which development and preservation should proceed, sharing a common scope, and not losing the very meaning of the city and the qualities that characterise it.

The identification of a Historic Urban Landscape can be understood as the result of a social-cultural recognition of **specific qualities and associated values in the built environment within its setting, justifying the planning policies, the measures required for safeguard as well as eventual corrective measures.**

Like restoration theory, the theory of HUL¹ is proposed to offer principles that can guide a historical-critical approach to the identification and recognition of specified **qualities and characteristics** in the environment, associated with **layers of significance**, proposed to be safeguarded, restored and/or revealed. Consequently, “Safeguarding” and “Integrated Development” mean encouraging processes of planning and management, while monitoring and controlling the forces and rates of change so as to retain and/or regenerate and enhance the qualities of HUL. This must be well integrated into the management system and plans in order to be effective.

¹ Cesare Brandi, *Teoria del Restauro*, Piccola Biblioteca Einaudi, 2000.

The recognition and definition of HUL will normally require additional research in order to bring together the necessary information regarding the qualities and the significance of the territory concerned, as well as an understanding of existing management measures. Once recognised, HUL should be taken as an overall management framework in order to guide the planning and management policies in the territory concerned. Subject to each case, the policies resulting from the identification of HUL would normally be implemented through existing planning and legal instruments, but taking into account and integrating the principles and guidelines developed in reference to HUL. The implementation of the policies and strategies of HUL can also include corrective measures that aim at enhancing the potential qualities of the historical territory.²

While the UNESCO Recommendation has been adopted in November 2011, the basic reference for this research was the **2010 Draft Recommendation on Historic Urban Landscape**, and the proposed **Draft Action Plan**,³ which contains **6 critical steps relating to the** implementing of the historic urban landscape approach.

These steps are the following:

- 1) Undertake comprehensive surveys and **mapping of the city's natural, cultural and human resources** (such as water catchment areas, green spaces, monuments and sites, view sheds, local communities with their living cultural traditions);
- 2) Reach consensus **using participatory planning and stakeholder consultations on what values to protect** and to transmit to future generations and to determine the attributes that carry these values;
- 3) **Assess vulnerability** of these attributes to socio-economic stresses, as well as impacts of climate change;
- 4) With these in hand, and only then, develop a city development strategy (CDS) or a city conservation strategy (CCS) **to integrate urban heritage values and their vulnerability status into a wider framework of city development**, the overlay of which will indicate (a) strictly no-go areas; (b)

² J. Jokilehto, *Notes on the Definition and Safeguarding of HUL*, April 2010

³ <http://whc.unesco.org/uploads/activities/documents/activity-638-59.pdf>

sensitive areas that require careful attention to planning, design and implementation; and (c) opportunities for development (among which high-rise constructions);

5) **Prioritize actions** for conservation and development;

6) Establish the appropriate **partnerships and local management frameworks** for each of the identified projects for conservation and development in the CDS/CCS, as well as to develop mechanisms for the coordination of the various activities between different actors, both public and private.

An analysis of the principles set out in the Draft Action Plan listed above, suggests a possible “model” on which to develop a methodological approach relative to the conservation/development of historic cities.

The Draft Action Plan is considered as a useful tool and valid basis for departure, even though a detailed examination has revealed some gaps. These gaps need to be analysed and “filled in” so as to enable the formulation of a coherent methodological approach. This method should provide a general framework. It should also be as complete as possible so that it can be used as a reference model for monitoring and management of continuity and change in historic urban areas and their surroundings. It should be possible to adapt this new instrument to specific contexts and across national territories, in order to facilitate implementation of supporting policies and to monitor the impact on the conservation of protected historic buildings and areas.

A. The Draft Action Plan, in the 6 critical points stated above, lists the need to map the local resources under point no. 1. During this stage, it is important to list the types of resources that should be identified and the method by which this mapping can be completed.

Resources are referred to the tangible and intangible aspects of heritage, to the city as well as to the natural and cultural landscape that it is part of.. We can therefore speak of architectural, artistic, archaeological, landscape, natural and ecological resources, as well as resources associated with spirituality and other intangible aspects of heritage.

All these resources together constitute the **common resources** that define the very **meaning** of the historic city. The meaning is the outcome of a series of natural and anthropic events linked to the conformation of the place and the

continuous interaction of man and nature with the place itself.

B. The second stage involves the definition of the importance of the resources, their vulnerability and their possibility of change.

In this sense, according to the theory of restoration, the city should be treated "as a whole", meaning that each resource must be evaluated in **relation to the other** resources and in relation to their meaning (as a whole) within the city.

During this stage, we must remember the need of also defining the **vulnerability** of the resources and in particular in areas subject to greatest urban development.

The problem of controlling development in historic cities is not so much related to the historic centre, where the protection tools are usually sufficiently appropriate and timely, but in particular to the areas lying outside. These areas are often insufficiently controlled by town planning tools, and can be beyond UNESCO protection (in the case of World Heritage property). It is here that we often see uncontrolled development in construction and infrastructural works giving a negative impact on the protected areas of the territory.

We must therefore assess the resources, their importance and their "possibility of change" within the whole of the historic city, with a view to overall balancing the development and conservation parameters throughout the territory.

It is necessary to construct a "map of intensity" and a "map of vulnerability" of the different parts of the territory concerned, taking into account the previous analyses. The aim is to identify the areas where resources "are of greater weight" with respect to the areas where they are of lesser weight. In this way, it is possible to identify the most vulnerable areas and contribute to planning the city's sustainable development in the future.

The starting point of these analyses is an in-depth study of the history of the place, its urban development and the definition of its identifying features. Here, the study of ancient maps, cartography and historical iconography is essential in order to understand the city's significance, and to define exactly **what** the resources are and **why** they are important. The aim is to search for a future development scenario that would take into account the **quality** of the place, and the **importance** and **vulnerability** of the different parts of the territory.

Another key element is the study and analysis of the past and present city

protection tools, which, as a general rule, describe the current conditions in greater or lesser detail and regulate future transformations.

In Italy, as in other European countries, there is a long tradition of town planning. In the 1st part of the research, we have already mentioned some Plans that have constituted (indeed continue to constitute) the foundations for the international town planning culture. These planning instruments should also rely on the study of the HUL as a whole, and they could be taken as the basis on which to read and understand the territory, and the city. Consequently, it is on this basis also that one should develop the required management strategy. Resulting from the study of HUL, the strategies must form a coordinated effort to constantly integrate existing planning instruments and conservation strategies.

All these general considerations, starting from the study of the international doctrine relative to the conservation of historic areas and landscapes, to the study of conservation theories and the history of town planning, and, finally, the UNESCO Recommendation on HUL and its Action Plan have resulted in the analysis of the HUL of the three Italian cities, Assisi, Urbino and Ferrara, discussed in parts 1 and 2 of the research and the consequent drafting of a methodological approach for the planning and management of HUL.

These 3 Italian cities have met this purpose very well, considering that they are relatively small and remain easily recognisable today in terms of their qualities and associated values, inherited from a glorious and exceptionally rich history and filled with documentary sources. Furthermore, the three towns have been provided with integrated town plans and are therefore suitable cases on which to verify the methodology of HUL.

Below is a scheme that, starting from the suggestions made in the Action Plan and the general remarks given above, defines a general methodological approach to the conservation of Historic Urban Landscapes.

16. GENERAL METHODOLOGICAL APPROACH TO THE CONSERVATION OF HISTORIC URBAN LANDSCAPES: From The UNESCO Action Plan To The General Guidelines

The city is associated with a stratification of meanings. It is like an ‘open book’ that, through its tangible and intangible heritage, the monuments, landscape and people, tells its history each and every day. However, every day the city is also subject to change and pressure of urban, economic and infrastructural development. The city is therefore a dynamic, not static entity. It cannot be seen as a static “monument”, but rather as a living organism.

Consequently, we can ask:

- How to accommodate the needs for modernisation and investment in historic cities and city centres without compromising their historic characters, identity and integrity?
- How to accommodate the needs for development in HUL without losing the qualities of the HUL itself?
- What are the limits of an acceptable change and what criteria are to be applied for evaluation and assessment?
- What are the limits and modalities for the introduction and integration of new buildings and new infrastructures within Historic Urban Landscapes?

...What could be a possible approach to the conservation and culturally and environmentally sustainable development of Historic Urban Landscapes?...

A possible methodological approach to the conservation of HUL takes as its starting point the study of the **meaning and significance** of the historic cities and the **tangible and intangible resources** comprising it.

- Through a study of the city’s history, its urban evolution through the centuries, and an assessment of the present situation, we can define its meaning and its significance.

- Through the study of cartography compared with the present situation, and the analysis of past and present instruments for planning, protection and management, we can propose to understand its resources and the qualities that these represent.

This is the starting point.

The final aim is to enable the development of the historic centre without losing the meaning and without losing the qualities that characterise it.

As a general rule, a possible methodological approach in relation to the conservation of HUL, which starts from the foregoing considerations and which particularly concerns architectonic and town planning aspects of the city, may include the following points:

1. IDENTIFICATION AND STUDY OF THE RESOURCES:

1.1. Identification/Description of Resources:

- historic-architectural-cultural resources: churches, historical buildings, palaces, places, vernacular heritage, industrial heritage, bridges etc.
- landscape resources: HUL includes the entire territory; it is essential to define the resources linked to the different type of landscape
- natural resources: lakes, mountains and, generally speaking, each natural feature that characterizes the territory
- ecological resources: primary components, secondary components, completion components (fragments), elements of ecological discontinuity, significant elements of continuity of the ecological net etc.
- social-economic resources: resources linked to the agricultural, industrial and, in general, every economic activity
- tourism resources: linked to pilgrimage or cultural networks
- symbolic resources: related to the "image" of the city and to the symbolism that it can suggest in relation to the presence of particular spiritual or, in general, cultural landmarks
- archaeological resources: related to the history of the place in relation to the

presence of remains from the past Ages

- resources linked to the intangible heritage: oral traditions and expressions, including language as a vehicle of the intangible cultural heritage; performing arts; social practices, rituals and festive events; knowledge and practices concerning nature and the universe; traditional craftsmanship etc.

Resources linked to the integrity of the HUL:

- The social-functional integrity of a place is referred to the identification of the functions and processes on which its development over time has been based, such as those associated with interaction in society, spiritual responses, utilisation of natural resources, and movements of peoples.
- The spatial identification of the elements that document such functions and processes helps to define the structural integrity of the place, referring to what has survived from its evolution over time
- Visual integrity, instead, helps to define the aesthetic aspects represented by the area.

Resources linked to the authenticity of the HUL.

- Authenticity associated with the results of human creativity in terms of design of architecture, town planning, gardens and landscapes;
- Authenticity associated with the historical-structural condition of the resources
- Authenticity associated with traditions, techniques, language and other forms of intangible heritage, as well as spirit and feeling or other issues.

Other resources linked to HUL

1.2. Description of the importance of the resources within the context of the Area

In line with the theory of Restoration, it is fundamental to define the historic city as a whole, so it is necessary to assess the importance of each part in relation to the others in the same territory.

1.3. Description of the "Vulnerability" of the Resources

The term "Vulnerability" refers to the level expressed in the lack of planning control or protection in an area, and consequently the possibility for potential negative alteration or destruction of the character. In this sense, as already mentioned previously, the areas outside the historic centre or outside the UNESCO perimeter are often more vulnerable, especially if they are not sufficiently controlled and/or protected by town planning or other instruments. It is here that particular attention will be required for the development of appropriate control mechanisms and planning criteria respecting overall character of HUL. It can be noted that generally speaking, the most vulnerable areas are also those most subject to change.

2. DIVISION OF THE TERRITORY INTO MACRO-AREAS

The territory can be divided up into macro-areas the characteristics of which are consistent in terms of their morphology, structure, location, etc..

3. DEFINITION OF THE INTENSITY OF RESOURCES IN MACRO AREAS ACCORDING TO WELL-DEFINED STANDARDS OF EVALUATION

(This section is referred to the ICOMOS Guidance on heritage impact assessments for Cultural World Heritage Properties)

This section indicates the "value" scale that defines the "weight" and importance of resources in each macro area, according to defined evaluation parameters:

- **Relative Importance / Value of Resources:**

– Very High	5
– High	4
– Medium	3
– Low	2
– Negligible	1
– Unknown	0

The scale of values is proposed to be applied as follows:

1. Inscription on the World Heritage List

area wholly inscribed on the core zone	Very High	5
area partly inscribed on the core zone and partly on the buffer zone	High	4
area wholly inscribed on the buffer zone	Medium	3
area partly inscribed on the buffer zone and partly out of it	Low	2
area not inscribed on the WHL	Negligible	1
Unknown area	Unknown	0

2. Protected areas

area wholly inscribed on 4 safeguard areas	Very High	5
area inscribed wholly/partially on 4 safeguard areas	High	4
area inscribed on 3 safeguard areas	Medium	3
area inscribed on 2 safeguard areas	Low	2
area inscribed on 1 safeguard area	Negligible	1
Unknown area	Unknown	0

3. Historic-cultural resources

Area with exceptional historic-cultural resources (in Assisi, for example Basilica of S.Francesco, Basilica of S.Chiara, Major fortress, temple of Minerva, Porziuncola)	Very High	5
Area with high historic-cultural resources (in Assisi, for example, Eremiti and other minor churches)	High	4
Area with medium historic-cultural resources (minor architectonic landmarks: churches, castles, monasteries etc.)	Medium	3
Area with low historic-cultural resources (scattered buildings)	Low	2
Area with negligible historic-cultural resources (scattered buildings containing items of particular importance)	Negligible	1
Area without any historic-cultural resources	Unknown	0

4. Landscape resources

Area with exceptional landscape resources (in Assisi, M.Subasio's Park)	Very High	5
Area with high landscape resources	High	4
Area with medium landscape resources	Medium	3
Area with low landscape resources	Low	2
Area with negligible landscape resources	Negligible	1
Unknown area	Unknown	0

5. Physical/natural resources

Area with exceptional physical/natural resources (SCI)	Very High	5
Area with high physical/natural resources (partly inserted in SCI areas)	High	4
Area with medium physical/natural resources	Medium	3
Area with low physical/natural resources	Low	2
Area with negligible physical/natural resources	Negligible	1
Unknown area	Unknown	0

6. Ecological resources

Area wholly inserted on the most significant ecosystems	Very High	5
Area partly inserted on the primary ecological paths and partly inserted on the secondary ecological paths	High	4
Area wholly included on secondary ecological paths	Medium	3
Area partially inserted on secondary ecological paths	Low	2
Area on minor ecological paths	Negligible	1
Unknown area	Unknown	0

7. Symbolical resources

Area with exceptional symbolical resources (e.g. Piazza S.Marco, Piazza S. Pietro etc.)	Very High	5
Area with high symbolical resources	High	4
Area with medium symbolical resources	Medium	3
Area with low symbolical resources	Low	2
Area with negligible symbolical resources	Negligible	1
Unknown area	Unknown	0

8. Social economic resources

Area with exceptional social-economic resources (production of DOC wine, olive groves etc.)	Very High	5
Area with high social-economic resources (partially inscribed on the production of DOC wine areas etc.)	High	4
Area with medium social-economic resources, without particular fine productions	Medium	3
Area with low social-economic resources	Low	2
Area with negligible social-economic resources	Negligible	1
Unknown area	Unknown	0

9. Pilgrimage and tourist resources

Area with exceptional tourist resources (for example Assisi o S.Pietro in Rome or Venice)	Very High	5
Area with high tourist resources	High	4
Area with medium tourist resources	Medium	3
Area with low tourist resources	Low	2
Area with negligible tourist resources	Negligible	1
Unknown area	Negligible	0

10. Visual integrity

Unspoiled area from the visual point of view	Very High	5
Area showing some variations from the visual point of view	High	4
Area showing some moderate variations from the visual point of view	Medium	3
Area showing high variations from the visual point of view	Low	2
Area highly damaged from the visual point of view	Negligible	1
Unknown area	Negligible	0

11. Other resources linked to HUL

Area with exceptional ...	Very High	5
Area with high ...	High	4
Area with medium	Medium	3
Area with low	Low	2
Area with negligible	Negligible	1
Unknown area	Negligible	0

4. DESCRIPTION OF THE OPPORTUNITIES OF CHANGE

(Ref. ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

This section highlights the “possibility of change” in relation to the maintenance of the essential qualities and characteristics characterising the local resources. Generally speaking, we can see that the possibility for change is higher, when there is greater lack of control in the area (i.e. lack of Master Plan or landscape protection, etc.) and consequently these parts of the territory have greater

vulnerability (physical, morphological, etc.).

A “scale of values” is defined as follows:

– Unknown	0
– No change	1
– Negligible change	2
– Minor change	3
– Moderate change	4
– Major change	5

The possibility for change of each resource is in relation to the vulnerability .

This status is related to:

- the lack of protection laws
- the inadequacy of protection laws
- the particular conformation of the territory
- the particular anthropic pressure in the territory

5. DRAFT INTENSITY PLAN IDENTIFYING THE AREAS WHERE IT IS POSSIBLE TO ESTIMATE THE DEVELOPMENT AND AREAS WHERE SAFEGUARD MEASURES ARE NECESSARY

The intensity map uses different colours to define the areas in which resources have a greater weight and, vice versa, areas in which resources are more scarce, where intervention is possible, establishing sustainable development.

6. DRAFT VULNERABILITY PLAN

This is a map which, on the contrary to the previous one, defines the most vulnerable areas

7. DRAFT ON AN INTENSITY/VULNERABILITY MODEL

This is a 3D model generated by the intensity/vulnerability maps, which shows the “importance of the resources” in each macro area, according to a scale of size

8. CHECK ON RESTRICTIONS AND THE EXISTING PLANNING IN THE SURROUNDINGS

This is a verification that allows the definition of restrictions that could be applied by town planning tools in the areas adjacent to the boundaries of the area.

9. DRAFT “CITY DEVELOPMENT STRATEGY” (CDS) OR A “CITY CONSERVATION STRATEGY” (CCS)

- Strictly no-go areas;
- Opportunities for development
- Opportunities for development, in particular for the construction of high buildings
- Already compromised areas that require attention to planning, design and implementation
- Partially intact areas that require careful attention to planning, design and implementation

10. DEFINITION OF PRIORITY ACTIONS FOR CONSERVATION/DEVELOPMENT

The definition will pay special attention to areas that are less protected, and more subject to alteration or destruction of the distinctive characteristics.

11. ESTABLISHING THE APPROPRIATE PARTNERSHIP AND LOCAL MANAGEMENT FRAMEWORKS FOR EACH OF THE IDENTIFIED PROJECTS FOR CONSERVATION AND DEVELOPMENT IN THE CDS/CCS,

As well as developing mechanisms for the coordination of the various activities between different actors, public and private. As we know, cooperation is essential.

12. RAISING AWARENESS THROUGH MEETINGS BETWEEN PEOPLE AND LOCAL AUTHORITIES

13. CREATION OF WEB SITES AND OTHER POSSIBILITIES TO SPREAD

INFORMATION

14. ESTABLISHMENT OF PERIODICAL REPORTS ON THE STATE OF CONSERVATION/DEVELOPMENT OF THE AREAS

The results of this methodological approach enable us to define a conservation and development strategy that considers the resources present in the area, their importance and vulnerability and which enables the sustainable development of the historic city.

Over the next few pages, the above considerations will be applied in the 3 study cities: Assisi, Urbino and Ferrara.



17. METHODOLOGICAL APPROACH TO THE CONSERVATION OF HUL: THE CASE OF ASSISI

17.1. Introduction: sources

As already presented in the second part of the research, the recognition of the set of distinctive values of the territory of Assisi as an inseparable group of tangible and intangible assets and of its uniqueness as an inherited “cultural landscape” with its archaeological, town planning, environmental, landscape and architectonic and artistic heritage values, underlies the philosophy of the new City General Plan¹, which, continuing the long route traced 60 years ago by Astengo, is marked by an in-depth awareness of the territory’s resources.

Going beyond the sterile division of urbanised areas and agricultural areas, which should now both be considered as having been anthropised and transformed by work and human activity, the Plan sets the aim of making the most of opportunities by which to transform the territory qualitatively, exploiting the resources of the environmental landscape as far as possible.

It provides a very exact identification of the resources characterising the entire municipal territory, studying them for all scopes and levels of awareness and disciplines deemed essential to the understanding and management of activities in the territory.

This is why the drafting of the Plan required not only knowledge of the territorial and cultural resources, but also the establishing of a system of networks and inter-relations between the parties, i.e. of organised resource systems able to protect and coherently promote territorial development.

The cartography and the reports comprising the new General Plan of Assisi are the main source from which the information was taken to prepare *The methodological approach to the conservation of HUL of Assisi*.

¹ Adopted by resolution of the Municipal Council no. 96 of 22.07.10

Methodological approach to the conservation of HUL: the case of Assisi

The essential cartographic sources have been suitably reprocessed and summarised in relation to the need to obtain useful information in order to get to know and optimise the local resources.

Another important source for the study of the location and the drafting of the Methodological Approach is the 2011 Management Plan of Assisi, which is the instrument aiming to guarantee the conservation of the values underlying the registration of the site on the UNESCO list, setting itself up as a management model of historic, cultural and environmental resources, able to guide the main choices in terms of territorial and economic transformation involving the area towards sustainability.

As concerns the study of the aspects relating to the city's integrity, the consultation of material held in the IUAV Project Archives has proven to be essential, as these include the "Astengo fund" in which the original documents relating to the Development Plans for the city of Assisi are held together with a great many other documented and photographic sources.

The research and inspections carried out *in loco*, with specific reference to the photographic campaign organised throughout the municipal territory also completed the analysis stage and proved to be essential in gaining more information on aspects connected above all with visual and functional relations between the different parts of the city.

In short, the sources used to prepare the *Methodological Approach to the conservation of HUL in the case of Assisi*, were:

- 2011 General Plan of Assisi
- 2011 Management Plan
- 2011 Linee Guida per la qualità del paesaggio di Assisi
- 1958 Assisi General Plan
- 1966 Assisi General Plan
- Perugia General Plan
- Bettona General Plan
- Bastia Umbra General Plan
- IUAV Archival Projects ("Astengo Fund")
- photographic survey
- internet sources

- for the definition of the intensity of resources/possibility for change: 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties

17.2. THE APPROACH

The methodological approach to the conservation of HUL in the case of Assisi includes the following points:

1. IDENTIFICATION AND STUDY OF THE GENERAL RESOURCES OF THE AREA:

1.1. IDENTIFICATION/DESCRIPTION OF THE RESOURCES:

- socio-economic resources
- symbolical-perceptive resources
- landscape resources
- ecological resources
- hamlets: Castelnuovo
 - Palazzo
 - Petrignano
 - Rivotorto
 - Santa Maria degli Angeli
 - Tordandrea
 - Tordibetto
- tourism and pilgrimage nets
- symbolical-perceptive resources
- physical-naturalistic resources
- historical-cultural resources
- The walled city:
 - green spaces
 - tissues morphology
 - archaeological persistence
 - roads

- resources linked to the integrity of the HUL

The "portrait of Assisi"...

Social-functional integrity: comparison between the old and the actual cartography

Structural integrity: comparison between the old and the actual cartography

Visual integrity. Subdivision of the territory into 11 areas:

AREA 1:

- the walled city
- views from the walled city
- landmarks

AREA 2

- outside the walled city

AREA 3

- hilly strip and at the foot of the hills behind the walled city

AREA 4

- hilly strip behind the walled city

AREA 5

- hilly strip to the west of the walled city

AREA 6

- the plains from SS 75 to S. Maria degli Angeli

AREA 7

- S. Maria degli Angeli and the plains after SS 75

AREA 8

- the plains towards Castelnuovo

AREA 9

- low Assisi plains

AREA 10

- the strip at the foot of the hills to the west of the walled city

AREA 11

- the far west are of Assisi

1.2. DESCRIPTION OF THE IMPORTANCE OF THE RESOURCES WITHIN THE WHOLE CONTEXT OF THE CITY

Each resource has been described in relation to its importance in the whole context of the city and in relation to its importance with other resources

1.3. DESCRIPTION OF THE "VULNERABILITY" OF THE RESOURCES

As we have said above, the term "Vulnerability" means a condition of easy alteration or destruction of the characters marking the areas. In this sense, as already mentioned previously, the areas outside the historic centre or UNESCO perimeter are more vulnerable, as they are often insufficiently protected by town planning tools and it is here that it is appropriate to pay more careful attention to action taken with a view to developing and conserving the HUL.

In the case of Assisi, the areas of the plains, and in particular the "*frazioni*" (administrative divisions) are the most vulnerable, with the urban and infrastructural development of recent decades having often resulted in the uncontrolled growth of construction, with a consequent loss of the very characters identifying the territory.

2. DIVISION OF THE TERRITORY INTO MACRO-AREAS, SIMILAR AS FOR RESOURCES

The territory has been divided up into various macro-areas which have similar characteristics in terms of their morphology, structure, location, etc. and within which similar resources can be seen.

These areas coincide with the "landscape system" as follows:

1. The landscape context of the high mountain of Subasio, C1, which includes:

- P1.1 - farming-shepherding landscape emerging from the morphology of the Subasio

2. The landscape context of the high hill, C2, which includes:

- P2.1 - agricultural, farming and shepherding landscape of the middle valley of Tescio
- P2.2 - agricultural-forestry landscape of environmental inter-connections

3. The landscape context of the facing hills, C3, which includes:

- P3.1 - landscape of the secondary ridges and resting castles

- P3.2 - landscape of the walled city and modern expansion
 - P3.3 - landscape of the terraced slopes of Asio and Subasio
4. The landscape context of the drainage river plains, C4, which includes:
- P4.1 - landscape of the middle valley and river terraces of Chiascio
 - P4.2- landscape of the transforming irrigation plain landscape (Petrignano, S.M. degli Angeli, Rivotorto, Palazzo, Capodacqua, Torchiagina)
 - P4.3 - landscape of the low valley of Tescio and the dry plain
 - P4.4 - landscape of the irrigation plains of Ose and Renaro

For each of these, the “dominant structure” has been identified and analysed in terms of its distinctive, physical-natural, historical-cultural, symbolic-perceptive and social-economic components that cause the identifying character to emerge that must be protected and enable the identification of the quality objectives to be pursued.

The ridges have also been identified, the dominant reliefs marking out the landscape, environmental and cultural identity of the territory and which can be distinguished in relation to their greater or lesser visual relevance.

Areas of high and very high visual sensitivity have been identified as areas respecting the ridges, of variable shape and size, bordered in relation to the type of ridge, the curves of the level and the extension of the surrounding valleys; these constitute a place worthy of attention and for safeguarding that within and represent heritage to be protected for its landscape and visual relevance with respect to the surrounding environment.

Finally, the panoramic routes have been identified, defined as the paths that have exceptional views and which require particular study.

3. DEFINITION OF THE INTENSITY OF RESOURCES IN MACRO AREAS ACCORDING TO WELL-DEFINED STANDARDS OF EVALUATION

(ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

The intensity of resources in macro areas is defined according to standards of evaluation, as following:

• **IMPORTANCE OF RESOURCES:**

- Very High 5
- High 4
- Medium 3
- Low 2
- Negligible 1
- Unknown 0

1. Inscription on the World Heritage List

area wholly inscribed on the Core zone	Very High	5
area partly inscribed on the Core zone and partly on the Buffer zone	High	4
area wholly inscribed on the buffer zone	Medium	3
area partly inscribed on the buffer zone and partly out of it	Low	2
area not inscribed on the WHL	Negligible	1
Unknown area	Unknown	0

2. Protected areas

area wholly inscribed on 4 safeguard areas	Very High	5
area inscribed wholly/partially on 4 safeguard areas	High	4
area inscribed on 3 safeguard areas	Medium	3
area inscribed on 2 safeguard areas	Low	2
area inscribed on 1 safeguard area	Negligible	1
Unknown area	Unknown	0

3. Historic-cultural resources

Area with exceptional historic-cultural resources (Basilica of S.Francesco, Basilica of S.Chiera, Major fortress, temple of Minerva, Porziuncola)	Very High	5
Area with high historic-cultural resources (Eremi and other minor churches)	High	4
Area with medium historic-cultural resources (minor architectonic landmarks: churches, castles, monasteries etc.)	Medium	3
Area with low historic-cultural resources (scattered buildings)	Low	2
Area with negligible historic-cultural resources (scattered buildings containing items of particular importance)	Negligible	1
Area without any historic-cultural resources	Unknown	0

4. Landscape resources

Area with exceptional landscape resources (M.Subasio's Park)	Very High	5
Area with high landscape resources	High	4
Area with medium landscape resources	Medium	3
Area with low landscape resources	Low	2
Area with negligible landscape resources	Negligible	1
Unknown area	Unknown	0

5. Physical/natural resources

Area with exceptional physical/natural resources (SIC)	Very High	5
Area with high physical/natural resources (partly inserted in SIC areas)	High	4
Area with medium physical/natural resources	Medium	3
Area with low physical/natural resources	Low	2
Area with negligible physical/natural resources	Negligible	1
Unknown area	Unknown	0

6. Ecological resources

Area wholly inserted on the most significant ecosystems	Very High	5
Area partly inserted on the primary ecological paths and partly inserted on the secondary ecological paths	High	4
Area wholly included on secondary ecological paths	Medium	3
Area partially inserted on secondary ecological paths	Low	2
Area on minor ecological paths	Negligible	1
Unknown area	Unknown	0

7. Symbolical resources

Area with exceptional symbolical resources (Basilica of S.Francesco)	Very High	5
Area with high symbolical resources	High	4
Area with medium symbolical resources	Medium	3
Area with low symbolical resources	Low	2
Area with negligible symbolical resources	Negligible	1
Unknown area	Unknown	0

8. Socio- economic resources

Area with exceptional social-economic resources (production of DOC wine, olive groves etc.)	Very High	5
Area with high social-economic resources (partially inscribed on the production of DOC wine areas etc.)	High	4
Area with medium social-economic resources, without particular fine productions	Medium	3
Area with low social-economic resources	Low	2
Area with negligible social-economic resources	Negligible	1
Unknown area	Unknown	0

9. Pilgrimage and tourist resources

Area with exceptional tourist resources (Basilica of S.Francesco, S.Chiara, S.Rufino, Eremo delle Carceri)	Very High	5
Area with high tourist resources	High	4
Area with medium tourist resources	Medium	3
Area with low tourist resources	Low	2
Area with negligible tourist resources	Negligible	1
Unknown area	Negligible	0

10. Visual integrity

Unspoiled area from the visual point of view	Very High	5
Area showing some variations from the visual point of view	High	4
Area showing some moderate variations from the visual point of view	Medium	3
Area showing high variations from the visual point of view	Low	2
Area highly damaged from the visual point of view	Negligible	1
Unknown area	Negligible	0

4. DEFINITION OF POSSIBILITY FOR CHANGE/VULNERABILITY OF RESOURCES ACCORDING TO WELL-DEFINED STANDARDS OF EVALUATION

(ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

- Unknown 0
- No change 1

- Negligible change 2
- Minor change 3
- Moderate change 4
- Major change 5

The possibility for change of each resource is in relation to its vulnerability.

This status is related to:

- the lack of protection laws
- the inadequacy of protection laws
- the particular conformation of the territory
- the particular natural or anthropic pressure in the territory (tourism, urbanization etc.) in relation both to the lack or to the inadequacy of protection laws

5. DRAFT OF AN INTENSITY PLAN IN ORDER TO IDENTIFY THE IMPORTANCE OF RESOURCES AND CONSEQUENTLY AREAS WHERE IT IS POSSIBLE TO CALCULATE THE DEVELOPMENT AND AREAS IN WHICH SAFEGUARD IS NECESSARY

The intensity map uses different colours to define the areas in which resources have a greater weight and, vice versa, those in which resources are more scarce, where intervention is possible, establishing sustainable development.

The colour dark red/orange is used on the intensity map to identify areas in which resources have a "greater weight" (or major intensity) and light green for the areas in which resources have a "minor weight" (or minor intensity).

6. DRAFT VULNERABILITY PLAN

This is a map that, differently to the previous, defines the most vulnerable areas and therefore those most subject to change.

Light blue has been used to define the areas that have a minor vulnerability and dark blue for the areas that have a major vulnerability

7. DRAFT ON AN INTENSITY/VULNERABILITY MODEL

It is a 3D model that shows the situation above illustrated

8. CHECK ON RESTRICTIONS AND THE EXISTING PLANNING IN

THE SURROUNDINGS

The town planning situation of some municipalities surrounding Assisi has been analysed and Perugia, Bettona and Bastia Umbra in particular.

9. DRAFT OF A “CITY DEVELOPMENT STRATEGY” (CDS) OR A “CITY CONSERVATION STRATEGY” (CCS) INCLUDING:

- strictly no-go areas
- opportunities for development
- opportunities for development, in particular for the construction of high buildings
- already compromised areas that require attention to planning, design and implementation
- partially intact areas that require careful attention to planning, design and implementation

More specifically, it is seen that the most protected areas (historic centre, hilly area and Monte Subasio) are those in which resources have a greater weight and in which vulnerability is least.

Vice versa, the areas of the *frazioni* and plains are those in which resources have lesser weight, they suffer lesser control in town planning terms and are therefore more vulnerable and subject to change.

In the area adjacent to the Petrignano industrial estate, from which Assisi can no longer be seen, it is possible to consider a territorial development including the design of high buildings that would not disturb the visual integrity toward the historic centre of Assisi.

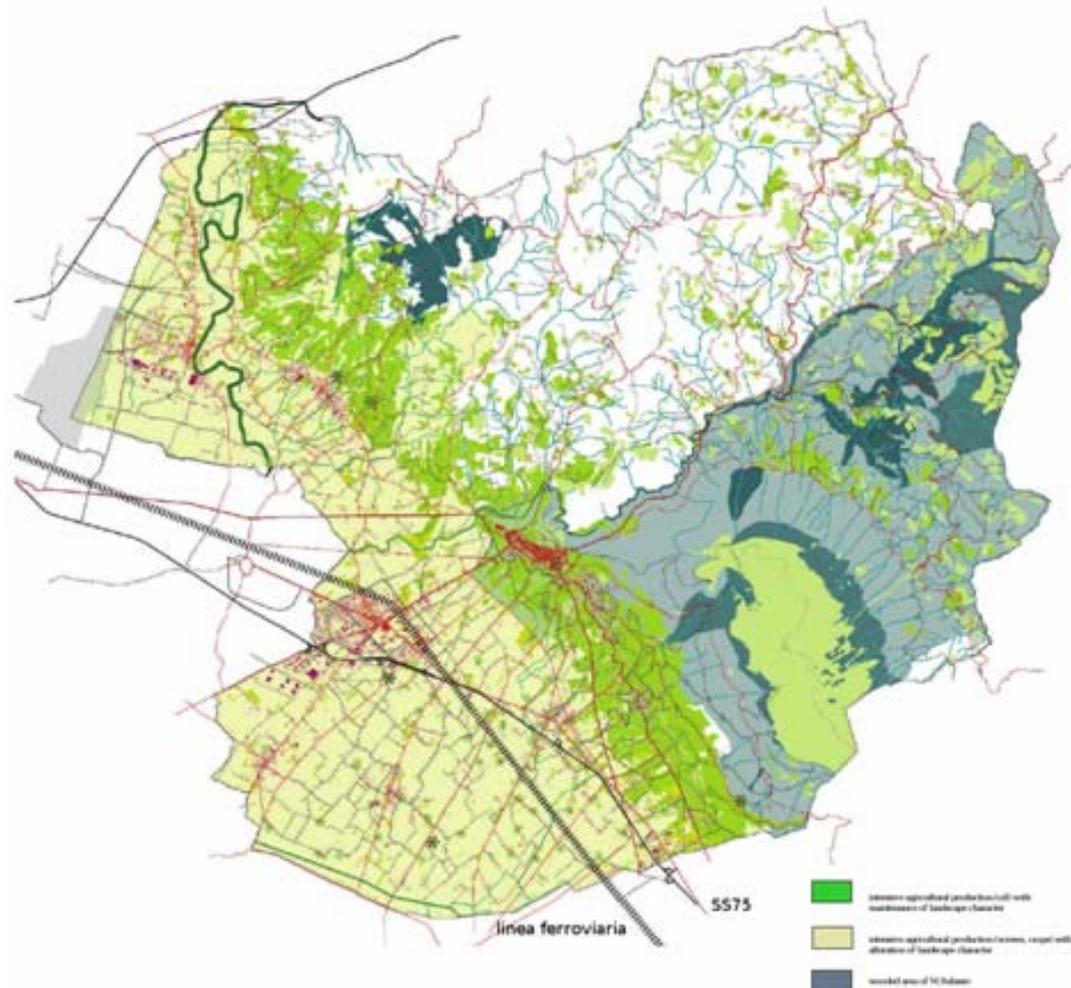
10. DEFINITION OF PRIORITY ACTIONS FOR CONSERVATION/DEVELOPMENT

Drafting of some general guidelines for the conservation and development of the historic city concerning the architectonic, social and environmental aspects, with specific regard to the areas that are less protected and therefore more easily subject to alteration or destruction of their distinctive traits.

The next few pages contain details of all the stages described above.

Identification / description of the resources

Socio - Economic resources



Farming plays an important role in the management of the country and economy. The agricultural surface is about 45% of the total/amount, (Istat 2000), and it is subject both to herbaceous and arboreal cultivation. Within it the main sub-category is that of simple sowable land.

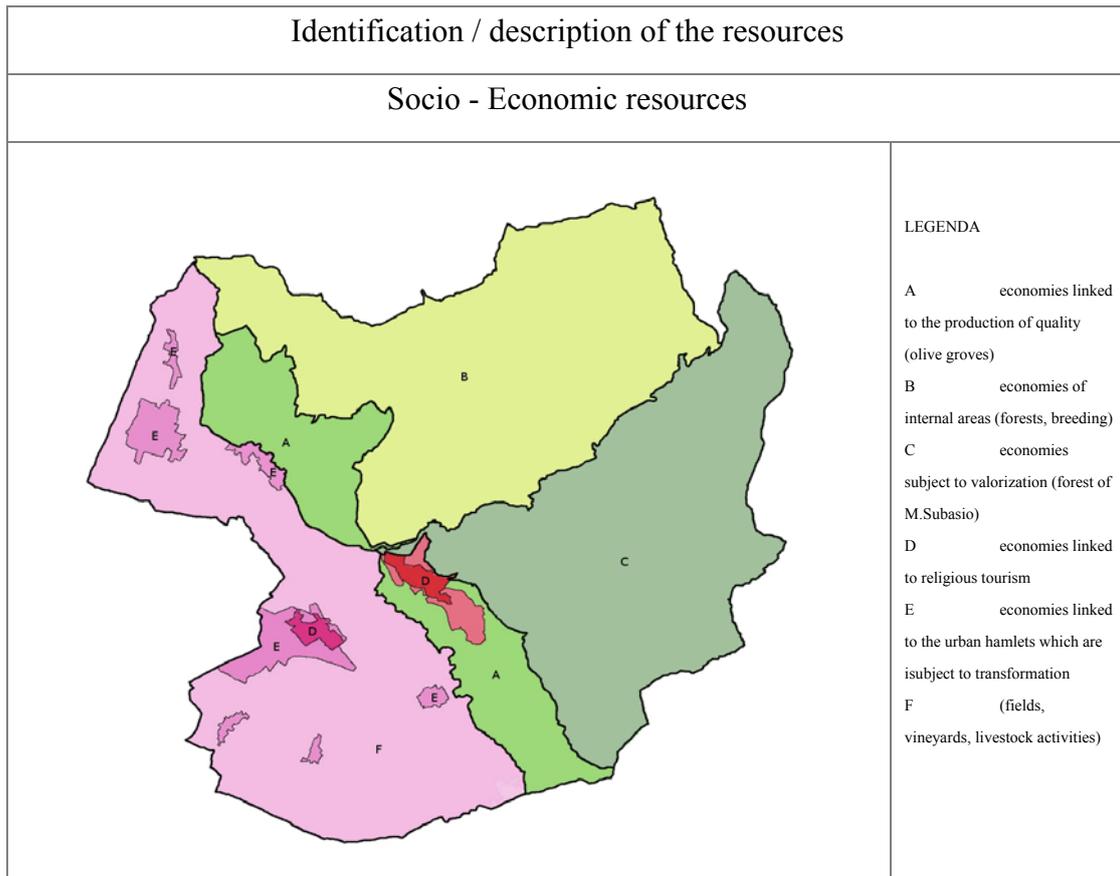
The forest area covers about 40% of the whole country and it is mainly situated on hills and mountains.

Most of the available agricultural surface is organized in small or small/medium business typologies. The distribution of cultivated surface in the various areas of a town is distinguished according to the pedoclimatic and orographic features of the country, and it is centred around Valle Umbra, where cultivated country has lately been reduced mainly by the rising phenomenon of urbanization.

Sowable land represents the main farming forms. The main permanent arboreal cultivations are the olive tree and the grapevine.

Rural environments carry out several functions and house different production activities (farm holidays and rural tourism).

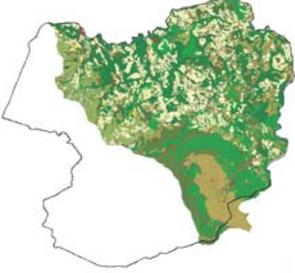
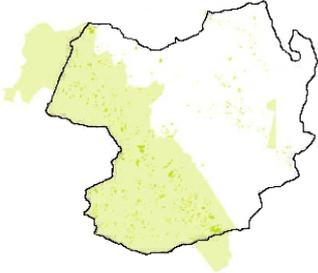
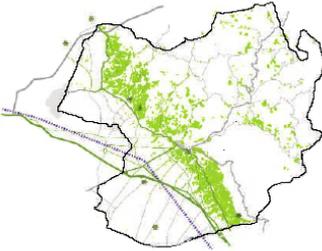
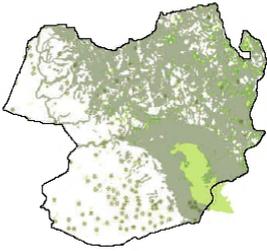
In such areas modern and innovative as well as local and traditional production systems well coexist. The country is at the same time rural and urban as a consequence of commuting, of the waste of production activities, of the spreading development of small enterprises.



Vineyards and arable fields

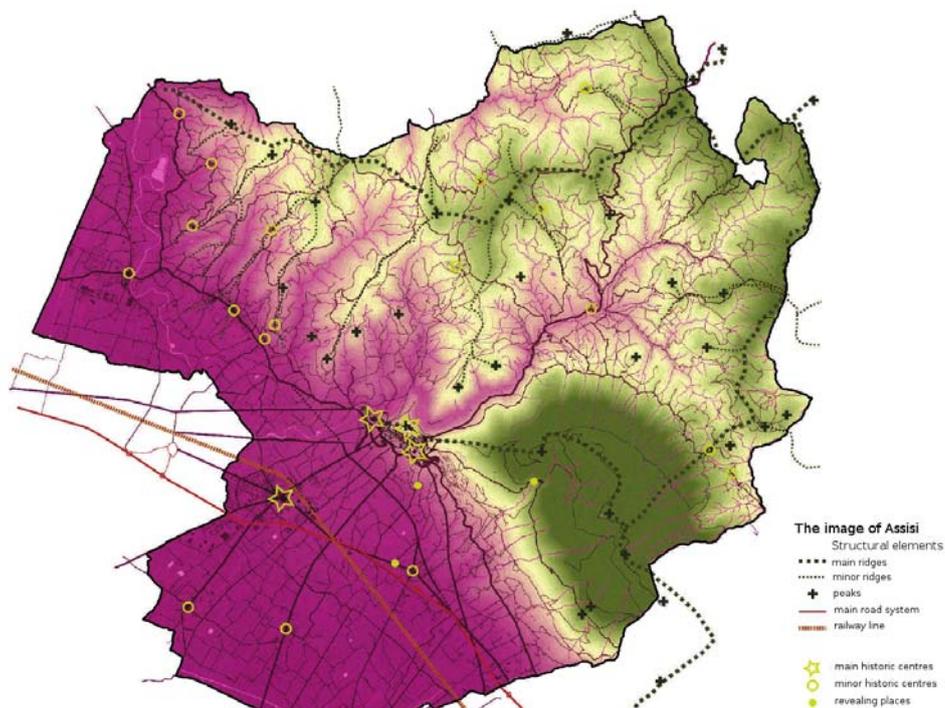


The forest to M.Subasio

Description of the importance/vulnerability of the resources		
Socio - Economic resources		
	Importance	Vulnerability
 <p>Aree boscate</p>	<p>1. Woodlands meant for safeguard and production; <u>High hills between Gualdo Tadino and Assisi:</u> in woody areas they now tend to manage forests and plan interventions. The most widespread activities consist in the action of cutting plans and the creation of forest paths and driveways to face and prevent fires, often built along the existing path layout. <u>On Mount Subasio</u> the possible different forms of exploiting the soil are sensibly reduced due to climate reasons; besides they are subjected to strict controls. The neglect of pastures and of the wildest sowable areas hasn't brought to the reforestation of the country, even if the quality of woods has increased thanks to the intervention of the authorities in charge. Top grasslands have been kept in good conditions thanks to the safeguard and the limitation of zootechnical activities. <u>The zone at the feet of Subasio (south):</u> a slight increase of woods is due to their important function of protection from instabilities, and to the safeguard bonds of the Park of Subasio.</p>	<p>In many areas of Assisi's countryside traditional farming activities have created special conditions (modification of the soil, microclimate, special management of water resources), thus favouring the growth of plant combinations which could not have existed without that special use. Such a peculiarity (as, for example, Subasio's tophill woods and grassland or traditional olive groves) attracts many visitors, whose presence may directly or indirectly alter the existing delicate balance of those areas.</p>
 <p>Area di produzione del vino DOC</p>	<p>2. olive groves concentrated on the lowhill zone overlooking Valle Umbra <u>High hills between Gualdo Tadino and Assisi.</u> Arboreal cultivations different from the olive have been replaced by specialized cultivations, while nearly all consociated vineyards have disappeared, have been abandoned or replaced by olive groves or timber trees. More and more land is devoted to specialized olive grove, and old areas have been thickened or wholly planted again after the hard frosts in 1985 and 1995. <u>Subasio's piedmont (south):</u> historic woody sowable areas have been almost completely replaced with olive groves and vineyards. There is a widespread rise in the amount of surface devoted to specialized olive grove, which tends to cover any available space. Historic olive groves keep on, even if the areas with sparse vegetation have been thickened or even planted again.</p>	<p>Authenticity/integrity of the resource:</p> <p>Built areas have increased sensibly, as a consequence of the renovation of buildings here and there and of the access and service road system. Urban centres are expanding more and more often, as well as the modern road network.</p>
 <p>Area di produzione dell'olio e zootecnia-</p> 	<p>3. plain farming production and zootechnical farming (cows and pigs) Intensive farming activities are widely situated in the country, but most structures are about to be dismissed or converted, with the exception of some zootechnical farming. Assisi and its neighbouring villages are provided with different farming typologies. Umbria Valley: the environmental unit of plain is characterized by both the disappearance of the traditional arboreal land and the majority of historic and traditional boundaries (bushes, rows of trees, ditches). Fields are usually quite vast and boundaries are no longer marked by rows of trees or ditches. Today the trend is to build mainly on plain areas, both in city centres and along the road network.</p>	

Identification / description of the resources

Symbolical - Perceptive resources



The image of Assisi seen from below, with the Subasio in the background, is still today the one reproduced by Niccolò Alunno in his “Gonfalone contro la Peste” (1468-70) or the one by Cipriano Piccolpasso in his “Descrizione dei caratteri multiformi del territorio storico della città”. Today, as in the past, the country is developed around some axis of convergence, whose focus is the city and in particular the ancient Hellenic central temple, later dilated into the triangular Medieval pattern with the Rocca and its Franciscan basilicas below as cornerstones. Enclosed by its 14th century town walls, the city shows close functional, morphological and symbolical relations among its parts and between these and its territory, thus pointing out the essential structural and visual uniformity of the whole system. Its original spatial structure has been so incisive as to affect the organization even of the complex of the surrounding areas and the set of functional and perceptive connections established with them. The modern expansion, developed eastwards in continuity of the walled one, is based on ancient piedmont serving paths, thus forming a nonstop sequence of mainly point or row buildings. The presence of a belt of olive groves and oak woods close to and within the walls represents the distinctive nature of the city, from the Middle Ages up to our time, as it is recorded in ancient iconography.

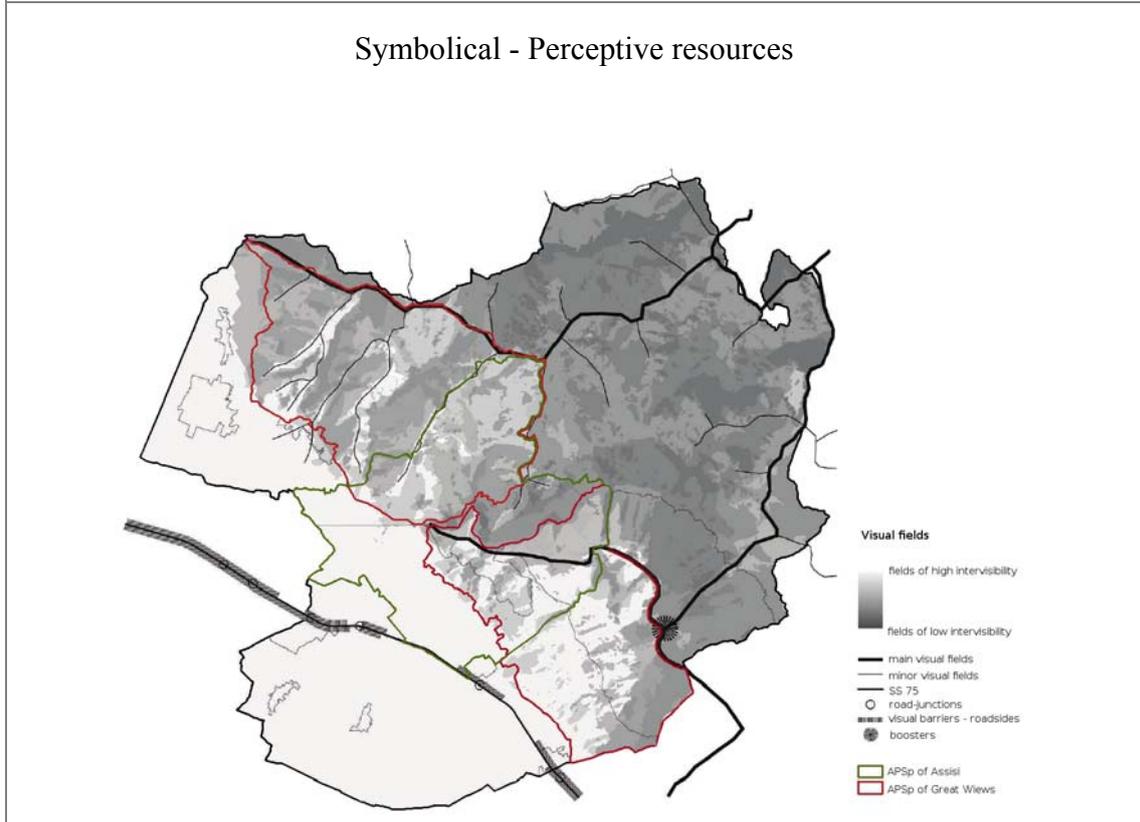
Praised by artists, scholars, travelers, illustrated by painters and photographers, this spatial organization is still today highly recognizable despite the recent insertions and transformations along the crossing axis of Umbrian valley and it still presents itself as the cornerstone of the image and settling structure of the whole area and icon of the whole region.

“Landscape, light, colour, houses, medieval towers, squares and famous buildings: a multitude of reciprocal perspectives from below and from uphill and, within the city, in the large sections of this built space; a sense of widespread calmness and sweetness, here are the traits contributing to build up the nature of this extraordinary city”.

¹ G.Astengo, "Il volto di Assisi", in Assisi, Piano Generale e Piani Particolareggiati di Primo Intervento, in Urbanistica 24,25 - 1° ristampa 1965, pag. 6

Identification / description of the resources

Symbolical - Perceptive resources



S. Francesco's Basilica



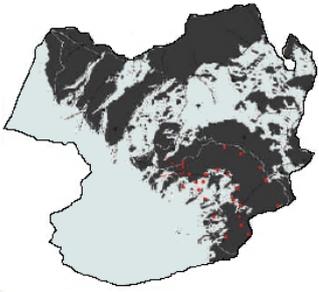
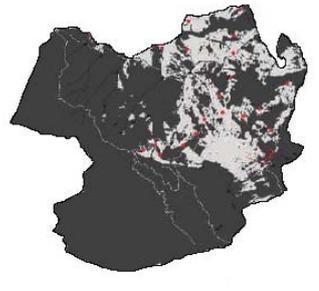
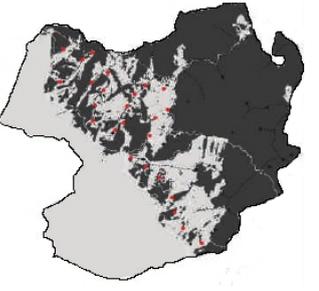
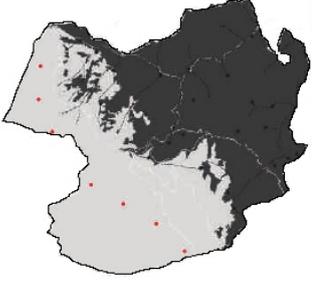
S. Chiara's Basilica



The hills

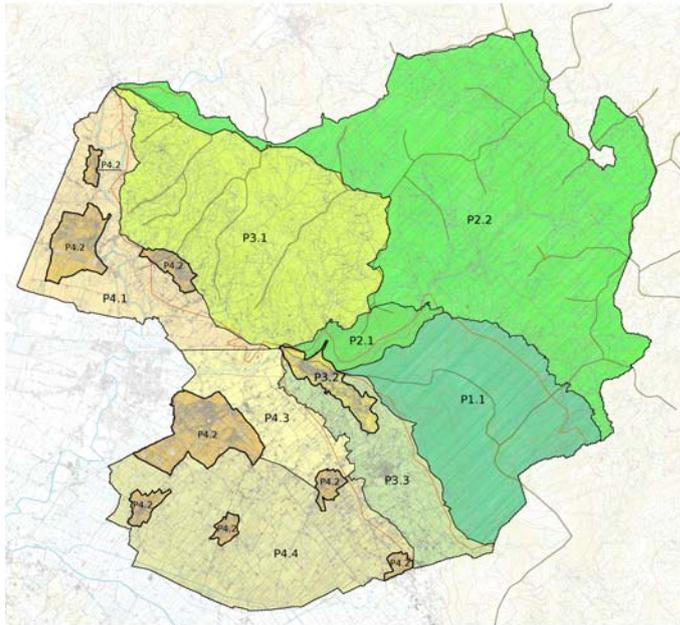


Minor Rocca

Description of the importance/vulnerability of the resources		
Symbolical-perceptive resources		
	Description	Vulnerability
 <p>The Subasio mountain</p>	<p>1- The Subasio mountain Represents the main image of the territory of Assisi, the first territorial point of reference, visible from a distance from the regional and main road system. From the top of mount Subasio, advantaged place for observation, it is possible to catch almost the entire territory of Assisi, as shown in the countless historical images of Assisi from below up to the top of the mountain.</p>	<p>From the top of the Subasio, place of the utmost visibility, it is possible to spot out the main panoramic viewpoints:</p> <ul style="list-style-type: none"> - The watershed ridge between the catchment area of the river Tescio and the Chiascio and of the high inside/interior hill; - The secondary crests of hillocks; - The Umbrian valley below. <p>From inside hills, place of the least intervisibility, it is possible to observe the main panoramic viewpoints:</p> <ul style="list-style-type: none"> - The ridge of Mount Subasio and the articulation of its inner mountainside; - The watershed ridge between the catchment area of the river Tescio and the Chiascio; - The secondary crests of hillocks enclosing the view of the valley of the Tescio towards the Umbrian Valley. <p>From facing hills it is possible to observe:</p> <ul style="list-style-type: none"> - The Umbrian Valley below and the agricultural articulated system from the minute net of channels; - The infrastructural crossing system, SS75, which is a barrier to the historic system heading up to the side streets, visually reinforced by tree rows (oaks, poplars); - The main historic urban centres of prime reference (S. Maria degli Angeli), minor historic local reference centres (Rivotorto, Tor d'Andrea, Castelnuovo) and the main meaningful places (The Sanctuary of Rivotorto, Saint Damian's Convent) - New building expansions -residential and industrial- more and more widespread particularly along SS75. <p>From the flood drainage plain, it is possible to observe:</p> <ul style="list-style-type: none"> - the panoramic viewpoint of Subasio's crest and of its upper wood mountainsides and the lower ones, cultivated with the olive - Assisi's walled city with its visual references represented by big architectural and religious monuments - the secondary crests of facing hills and the net of <i>castleocks</i>.
 <p>The high inside hill</p>	<p>2- The high inside hill Represents the hidden image of the territory of Assisi, an inside visual area, closed but complex, with some stretches completely closed to the sight and some views with a potential value of local identity.</p> <p>Together with the main crossing road system and the one heading back up to the valley of the Tescio, there are several minor historic paths, leading to inner historic centres or to isolated farming buildings with landscape and geological points of observation.</p>	
 <p>Facing hill</p>	<p>3- Facing hills Represent the image of the territory of Assisi, while approaching the walled city from the main road system and while walking through minor historic centres. The facing hills, situated along the piedmont belt at the feet of Mount Subasio and of Asio, and along the complex of secondary crests along the Chiascio, cultivated from the Middle Ages to our time, keep carrying a remarkable cultural entity.</p>	
 <p>Flood drainage plain</p>	<p>4- Flood drainage plain Represents the image of the territory of Assisi in which the historic occupation of the ground has witnessed the conversion of the uses of the tree sowable land into simple sowable one (land).</p> <p>Settling, residential and productive pressures mainly affect the urban centres along the main crossing territory infrastructures and the ones linking them with the regional road system (highways), thus fusing together once isolated units.</p>	

Identification / description of the resources

Landscape resources



Landscapes

The territory of Assisi is characterized by the mountainous group of Subasio, which is surrounded by a hilly area that connects it with the flat area of the Valle Umbra , creating a rich in historical and artistic value of exceptional importance landscape.

In the system of the landscape are identified and defined, within large regional systems of reference (mountains, high hills, plains and valley) identified in PTCP four main landscape contexts and their respective internal landscapes:

1. The landscape context of the high mountain of Subasio, C1, which includes:
 - P1.1 - farming-shepherding landscape emerging from the morphology of the Subasio
 2. The landscape context of the high hill, C2, which includes:
 - P2.1 - agricultural, farming and shepherding landscape of the middle valley of Tescio
 - P2.2 - agricultural-forestry landscape of environmental inter-connections
 3. The landscape context of the facing hills, C3, which includes:
 - P3.1 - landscape of the secondary ridges and resting castles
 - P3.2 - landscape of the walled city and modern expansion
 - P3.3 - landscape of the terraced slopes of Asio and Subasio
 4. The landscape context of the drainage river plains, C4, which includes:
 - P4.1 - landscape of the middle valley and river terraces of Chiascio
 - P4.2- landscape of the transforming irrigation plain landscape (Petrignano, S.M. degli Angeli, Rivotorto, Palazzo, Capodacqua, Torchiagina)
 - P4.3 - landscape of the low valley of Tescio and the dry plain
- P4.4 - landscape of the irrigation plains of Ose and Renaro

Identification / description of the resources
Landscape resources



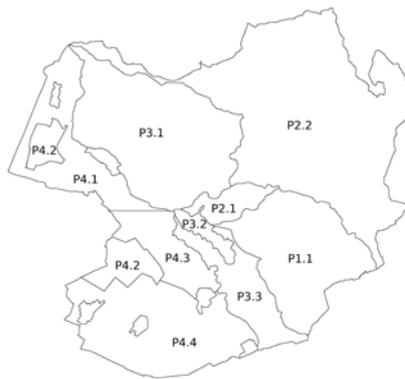
Landscape P1.1



Landscape P2.1



Landscape P2.2



Landscape P3.1



Landscape P3.2



Landscape P3.3



Landscape P4.1



Landscape P4.2

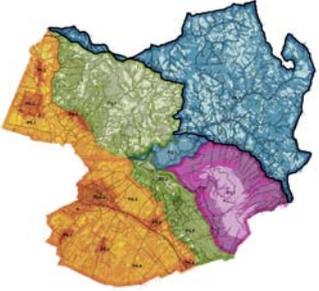


Landscape P4.3



Landscape P4.4

Description of the importance/vulnerability of the resources		
Landscape resources		
	Description	Vulnerability
 <p>P1.1 - farming-shepherding landscape emerging from the morphology of the Subasio</p>	<p>P1.1 This section of landscape comes under:</p> <ul style="list-style-type: none"> • the UNESCO site entirely • the Mount Subasio Park entirely • APSp di Assisi e APSp dei Grandi panorami/partially. <p>It brings together various natural and anthropic associations linked to forestry and rural activities. The settlement area has castles at the edges of wooded hillside slopes. Human presence dating back to the Early Middle Ages is represented by the Benedictine abbey of St. Benedict and the network of retreats connected to the town via a single trail circuit. The Carceri forest with its thousand-year-old evergreen wood dominated by holm oak with high geobotanical value, is a significant environmental/historical resource, and an integral part of the well-established appearance of the whole territory. The infrastructure, historically represented by an extensive network of paths and trails, is split over a main thoroughfare re-ascending the ridge and hillside paths, all with great historic and scenic value.</p> <p>P 2.1 This section of landscape comes under:</p> <ul style="list-style-type: none"> • the UNESCO site entirely • Mount Subasio Park partially • APSp di Assisi entirely. <p>It has various anthropic and natural characteristics mainly linked to farming and forestry activities. The settlement area is historically marked by the presence of isolated structures, towers, mills and water service buildings. Use is mainly for simple arable farming, olives with the remains of ancient terracing. The infrastructure is historically represented by three main thoroughfares, the first crossing towards Gualdo Tadino, the second exiting from Porta S. Giacomo towards the river and the bridge of the Galli and the third exiting from Porta Perlici, from which the small network of locally distributed service paths and trails commences.</p>	<p>P1.1 The landscape is characterised by:</p> <ul style="list-style-type: none"> - natural resources of significant value - wooded areas with high geobotanical value - building heritage of great monumental or historical interest, and sites of historical interest - highly stable landscape appearance - presence of exceptional scenic points and open views - significant integrity of historical heritage <p>This area represents an important resource in terms of forest production and animal husbandry. On the negative side, it is subjected to significant pressures of transformation, especially in the area at the edge of the town, transformation which has however been suitably controlled by the General Town Planning Scheme of Assisi.</p> <p>Other anthropic interference is linked to the use of summit areas and the presence of telecommunication service structures and relay stations. From an agricultural point of view, an end to forestry and rural activities has occurred, leading to the abandonment of grazing land and meadows at the summit. From a geological point of view, there is the presence of instability and erosion phenomena on the steepest slopes.</p> <p>P2.1 The landscape is characterised by:</p> <ul style="list-style-type: none"> - extremely high landscape importance - valuable cultivations of great historical importance - high level of historical heritage conservation - natural resources of significant value. <p>On the negative side, it is subjected to interference/disturbances linked to the use of the protected natural area.</p>
 <p>P2.1 - agricultural, farming and shepherding landscape of the middle valley of Tescio</p>		

Description of the importance/vulnerability of the resources		
Landscape resources		
	Description	Vulnerability
 <p>P2.2 - agricultural-forestry landscape of environmental inter-connections</p>	<p>P 2.2 This section of landscape comes under:</p> <ul style="list-style-type: none"> ▪ the UNESCO site entirely ▪ Mount Subasio Park partially <p><u>Upper valley of the Tescio:</u> The settlement area is historically concentrated. Human presence, already attested to in ancient times and in the Early Middle Ages, is characterised by the system of castles (Armenzano, Notiano, Petrata). The upper valley of the Tescio is an EU habitat of interest (SIC), with significant naturalistic importance. The infrastructure is historically represented by two main thoroughfares in continuation of those in the mid-valley of the Tescio, one crossing towards Gualdo Tadino, and the other crossing the hillside on the internal slope of the Subasio, on which the small network of locally distributed service paths and trails, and internal centres is arranged.</p> <p><u>High valley of the Chiascio:</u> The settlement area has isolated structures. Land occupation dates back to Roman times. The system of castles (Pieve S.Nicolò, Porziano, Paganzano) was strengthened in the municipal period in relation to the upper hill grazing economy. The part of the valley included in the municipal area includes upper hills mainly used for simple arable farming, trees, olive groves, and coppices and deciduous woods. The infrastructure is historically represented by the main thoroughfare connecting to Gubbio which, re-ascending in the municipality of Valfabbrica, supports the local distribution network of service paths and trails.</p>	<p>P2.2 The landscape is characterised by:</p> <ul style="list-style-type: none"> - highly stable landscape appearance - wooded areas with high geo-botanical value - considerable ecological value of the mosaic use of the land - great historical importance - high level of historical heritage conservation <p>On the negative side, it is subjected to pressures of transformation around the centres and along main thoroughfares.</p> <p>P3.1 The landscape is characterised by:</p> <ul style="list-style-type: none"> - highly stable landscape appearance - great historical importance - high level of historical heritage conservation - valuable cultivations <p>On the negative side, it is subjected to pressures of transformation around the centres and along main thoroughfares. From an agricultural point of view, typical farming systems and historical cultivations have been abandoned, especially olive groves.</p>
 <p>P3.1 - landscape of the secondary ridges and resting castles</p>	<p>P 3.1 This section of landscape comes under:</p> <ul style="list-style-type: none"> ▪ the UNESCO site entirely ▪ APSp di Assisi/partly e APSp dei Grandi Panorami entirely. <p>The settlement area is alongside the old system of castles (S.Gregorio, Rocca S.Angelo, Sterpeto, Mora, Beviglie, Tordibetto), situated in a dominating position overseeing the plains. Land use involves the overriding presence of olive groves whereas the slopes are characterised by woods mainly with Turkey oak. The infrastructure is historically represented by secondary routes and the main route connecting to Valfabbrica and Gualdo Tadino.</p>	

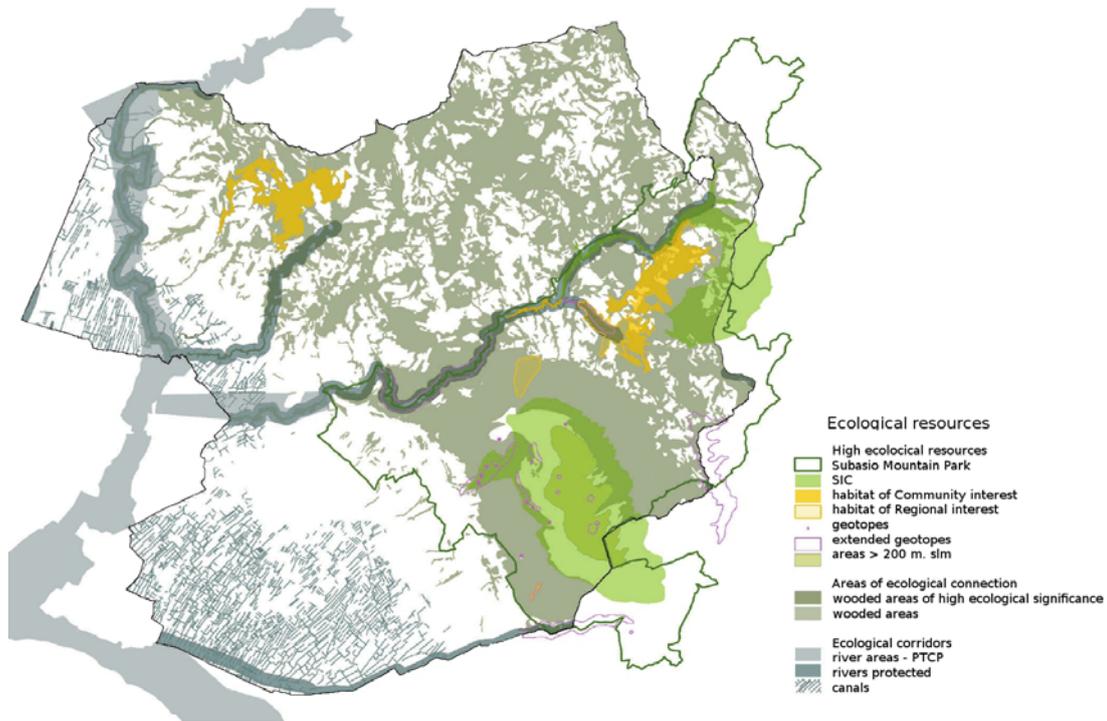
Description of the importance/vulnerability of the resources		
Landscape resources		
	Description	Vulnerability
 <p>P3.2 - landscape of the walled city and modern expansion</p>	<p>P3.2 This section of landscape comes under:</p> <ul style="list-style-type: none"> • the UNESCO site entirely • the Mount Subasio Park entirely • APSp di Assisi e APSp dei Grandi Panorami entirely <p>The settlement area of the walled town, founded on a large Hellenistic sanctuary, has conserved the primitive scenic setup of its original terraced structure. Contained within its 14th century boundary wall, connected between the three great visual strongholds (S.Francesco, S.Chiaira, La Rocca Maggiore) at the extremes of its compositional form, the town highlights close functional, morphological and symbolic relationships between its parts, and between its parts and the surrounding area. The original spatial structure was sufficiently effective to also organise the surrounding areas, and assemble functional, insightful connections to established elements. Modern expansion, developed in continuation east of the walled expansion, lies on ancient foothill routes, constituting a continual sequence of dot-like and terraced buildings, and blocks of flats.</p> <p>The network of routes is arranged over a double internal system, formed by the thoroughfare that connects the central square to the two main basilicas (S.Francesco, S.Chiaira), and the side web of streets which, again departing from the square, exits the town, and looks towards the peaks beyond the valley. Added to this network is an external ring road which has facilitated access to the town of Porta Nova, and therefore brought about an increase in building to the East.</p>	<p>P3.2 The landscape is characterised by maximum stability of landscape appearance, and a high level of integrity of historical heritage. This has created a need to extend conservation measures from the historical centre to the historical town, and closely control transformation processes that are transpiring behind the town itself. These protective measures include safeguarding the appearance of the whole historical town, including monumental historical heritage, artistic heritage, the urban layout of open spaces, safeguarding the lower historical network, rural paths and existing trails, farming systems with landscape value, historical cultivations, especially olive groves and wood formations (St. Francis wood), natural elements represented by wooded areas with geo-botanical value in order to safeguard the environment and geomorphological balance, protecting scenic points and open views, controlling forest habitats, especially those in wildlife corridors which serve as an ecological connection to wooded areas on Mount Subasio, and controlling settlement transformations on the edges of, and in, existing centres and pressures relating to tourism (accessibility, services).</p>
 <p>P3.3 - landscape of the terraced slopes of Asio and Subasio</p>	<p>P3.3 This section of landscape comes under:</p> <ul style="list-style-type: none"> • the UNESCO site entirely • Mount Subasio Park partially • APSp di Assisi/partially e APSp dei Grandi Panorami entirely. <p>The settlement area dominates the entire front face, tracing structures from Roman times, documented by the presence of numerous ruins of places of worship, burial places and civil structures (villas, tanks, springs). Well-established land use sees the presence of specialist olives in terraced arrangements, with regularly arranged curves.</p> <p>The infrastructure is historically represented by a system of routes exiting the gates in a southern direction towards the valley and to the east towards Spello.</p>	<p>P3.3 The landscape is characterised by:</p> <ul style="list-style-type: none"> - highly stable landscape appearance - great historical importance - high level of historical heritage conservation - valuable cultivations <p>On the negative side, it is subjected to pressures of transformation around the centres and along main thoroughfares</p>

Description of the importance/vulnerability of the resources		
Landscape resources		
	Description	Vulnerability
 <p>P4.1 - landscape of the middle valley and river terraces of Chiascio</p>	<p>P4.1 This section of landscape comes under:</p> <ul style="list-style-type: none"> ▪ the UNESCO site partially and the buffer zone partially ▪ APSp di Assisi/partially.. <p>This landscape is heavily marked by the presence of the watercourse.</p> <p>The scattered settlement area dominates the entire section which has numerous isolated private and sharecropper houses and networks of channels and gullies with rows of trees planted for remedial purposes to strengthen banks;</p> <p>The lower infrastructure is linked to large land remediation operations and is witness to significantly regular modular division, which could be put down to the similar centuriation whose highest foundation is represented by the North-South route laterally crossing the valley.</p> <p>P4.2 This section of landscape comes under:</p> <ul style="list-style-type: none"> ▪ the UNESCO site partially and the buffer zone partially <p>The landscape of the irrigation plain under transformation (Petignano, S.M.degli Angeli, Rivotorto,) Palazzo, Capodacqua, Torchiagina) constitutes a series of distinct sections that demonstrate a transformation dynamic which has been accelerating in recent years.</p> <p>The originally different settlement area (tower, castle, sanctuary) is of limited dimensions, and has changed over time.</p> <p>The main infrastructure is again that of an ancient formation, which has registered adaptations in its sections in relation to circulation and safety requirements. A distinguishing feature here is the large provincial road crossing through lengthwise (SS75), which constitutes a barrier between the two parts of the crossed area. By crossing the plain centres this significantly affects their layout and simultaneously produces a transformation in the setup of centres, which go from being sporadic to becoming linear and continuous along the same thoroughfare.</p>	<p>P4.1 The landscape is characterised by:</p> <ul style="list-style-type: none"> - changes to landscape characteristics due to significant anthropic pressure linked to modern building expansion - the loss of the original character of settlement centres - chaotic and scattered organisation of the road network and road links between centres - From an agricultural point of view, land suitable for planting trees has been replaced with simple arable land, and with this a large part of related agricultural systems have disappeared. This transformation has led to an extension in average field dimensions and a reduction in their boundary elements. <p>P4.2 The landscape is characterised by:</p> <ul style="list-style-type: none"> - the loss of the original character of settlement centres. The originally different settlement area (tower, castle, sanctuary) of very limited dimensions has changed over time, especially after the Second World War, giving rise to chaotic, scattered clusters of buildings. - disjointed construction especially along the main road networks - changes to the visual integrity of locations <p>Internal agricultural areas, which were originally used for tree planting, have now been mostly replaced by simple arable land or abandoned, but are still an important component in the distinctive character of these settlements.</p>
 <p>P4.2- landscape of the transforming irrigation plain landscape</p>		

Description of the importance/vulnerability of the resources		
Landscape resources		
	Description	Vulnerability
 <p>P4.3 - landscape of the low valley of Tescio and the dry plain</p>	<p>P4.3 This section of landscape comes under:</p> <ul style="list-style-type: none"> ▪ the UNESCO site partially and the buffer zone partially ▪ Mount Subasio Park partially ▪ APSp di Assisi entirely. <p>This landscape constitutes one of the most significant in the territory. It includes the vast plain below the walled town, marked in ancient times by the centuriation grid and in medieval times by the widespread natural resources of Franciscan heritage.</p> <p>The main infrastructure is defined by four radial ancient routes rising up transversely between Assisi (from Porta Moiano to Porta S.Pietro), and the Basilica of S.Maria degli Angeli on the plain, and from the longitudinal route of Via Francesco linked to the history of Franciscanism.</p> <p>P4.4 This section of landscape comes under:</p> <ul style="list-style-type: none"> ▪ the UNESCO site partially and the buffer zone partially <p>This landscape is purely agricultural, with numerous examples of isolated rural companies and farmhouses and an extensive network of channels and gullies with rows of trees to strengthen banks.</p> <p>The main infrastructure is set up on the radial pattern connecting to the town, joined by the main route crossing the plain formed by the SS75, which has led to a linear direction of development which is mainly continuous from Perugia to Foligno.</p>	<p>P4.3 The landscape is characterised by:</p> <ul style="list-style-type: none"> - the prolonged existence of the settlement area of scattered farm division which has continued significantly till present day in its original layout of isolated private and/or sharecropper houses, partially due to protective measures provided by the General Town Planning Scheme of Astengo. Farming areas, which were traditionally used for tree planting have almost all been replaced with simple arable land. Planted trees remain however in row arrangements along ditches or roads, in pairs to mark a road junction or the entry to a private house, contributing to the recognition of distinctive historical characteristics of this landscape. On the negative side, it is subjected to pressures of transformation around the centres and along main thoroughfares. <p>P4.4 The landscape is characterised by:</p> <ul style="list-style-type: none"> - significant persistence of farming activities; this system is heavily influenced by the attraction of a concentrated settlement area, which poses a risk to conservation and the enhancement of country and landscape planning produced over time by agricultural remediation. Land use, which until recent years was characterised by tree planting areas, has increasingly been replaced by simple arable land, leading to the abandonment and often the disappearance of soil arrangements. This transformation, as with the mid-valley landscape and the fluvial terraces of the Chiascio, has led to an extension in field sizes and a reduction in their bordering elements.
 <p>P4.4 - landscape of the irrigation plains of Ose and Renaro</p>		

Identification / description of the resources

Ecological resources



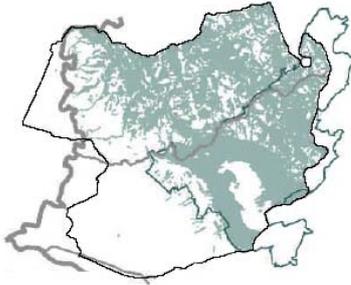
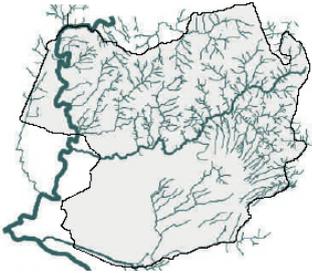
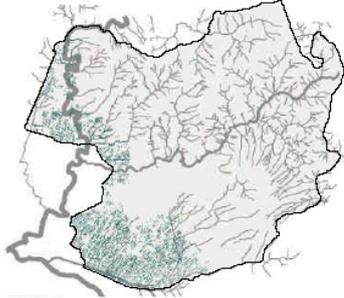
The ecological net is composed of:

- a. Primary components (Regional Units of Ecological Connection); these are the most significant ecosystems, they represent the backbone of the net and include protected natural areas and the areas of naturalistic interest which have been recognized by national and international institutions.
 - b. Secondary components (ecological paths); these are the linking areas between primary and secondary components. They include the main hydrographic net and its related vegetation, as well as part of the agricultural areas.
 - c. Completion components (fragments); these are the elements integrating and completing the ecological net, which are not reciprocally connected to primary components; they include several elements of naturalistic resources.
 - d. Elements of ecological discontinuity: they represent physical barriers interrupting the continuity of ecological components and they identify the obstacles to ecological permeability and to the circulation of wildlife between and among different ecosystems; they include built areas, works and infrastructures which interrupt the continuity of the main ecological paths (corridors).
 - e. Significant elements of continuity of the ecological net: these are maintaining works of the ecological continuity susceptible to damage by project artifacts, like viability, new buildings, new infrastructures or works and elements for the safeguard of wildlife in delicate areas.
- Re-establishment areas of ecological continuity: they are accurate works of re-establishment of the ecological continuity interrupted by existing barriers.

Methodological approach to the conservation of HUL: the case of Assisi

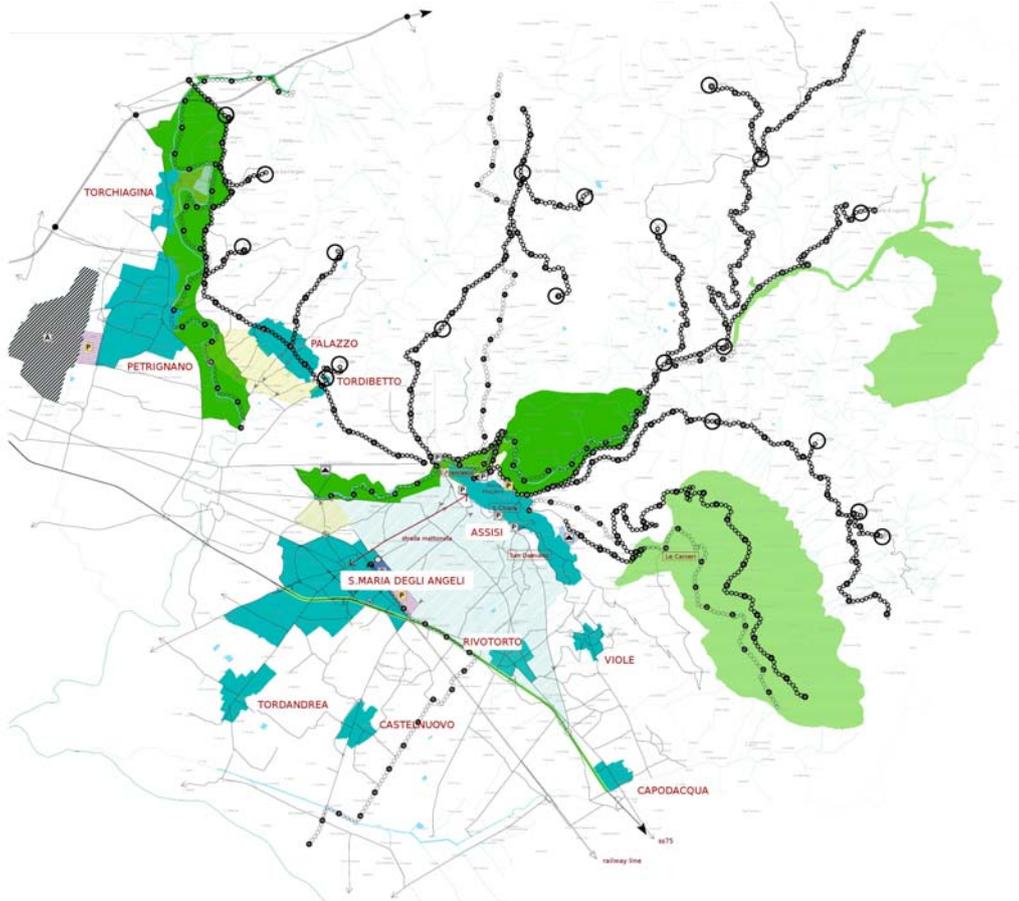
Identification / description of the resources
Ecological resources



Description of the/vulnerability of the resources		
Ecological resources		
	Description	Vulnerability
 <p>The main areas of ecological connection</p>	<p>Primary components are the most delicate and sensible areas of the territory, and a special attention is to be paid to actions of safeguard of ecosystems.</p> <p>The main areas of ecological connection are to be identified within the wide area including the landscape unit of Mount Subasio, in the agropasture woodland of the middle valley of the Tescio, in the agroforestral essay of environmental interconnections and in the landscape of secondary crest and of castlelocks.</p>	<p>The presence of elements of ecological discontinuity, i.e. physical point or linear barriers, built areas, works and infrastructures interrupting the continuity of ecological components and representing obstacles to the circulation of wildlife between and among different ecosystems, interrupts the continuity of primary and secondary ecological paths. This situation is particularly visible in the plain of Assisi, where the increase of urbanization in the last decades has caused the modification of the ecological system of the area.</p> <p>From the agricultural point of view, sowable land has been replaced by simple sowable land, and along with it most elements of agricultural organization have disappeared. This change has implied an extension of average field dimensions and a reduction of their boundary elements, such as ditches.</p>
 <p>The main and the secondary components of ecological connection</p>	<p>Secondary components aim at linking primary components. They fall into different components of rural space, whose allowed transformations must never reduce and alter the degree of existing naturalness and thus affect the present level of biocapability of the territory.</p>	
 <p>The minor components of ecological connection</p>	<p>The linking components are minor elements of the net, which guarantee its systemic and thorough/capillary functioning; the possible transformations allowed in the components of the rural space shall provide for actions aiming at the integration with the other components. They cover most of town territory. In particular in the plain of Assisi there are countless ditches and waste water drains, in the past used by agriculture.</p>	

Identification / description of the resources

Hamlets



The hamlets are mainly characterised by a central medieval core subsequently surrounded by a modern town, which developed in a random, non-uniform fashion, with a resulting loss of urban identity.

Many hamlets are subjected to a volume of traffic, which is unsuitable for their structure due to their position along major road networks, and are sometimes excessively isolated as regards the possibilities produced by the area.

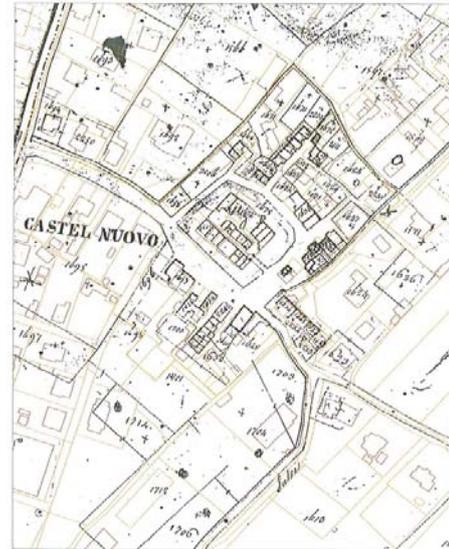
The hamlet of S.Maria degli Angeli in particular feels the effect of this situation. The SS 75 road passes through it to the South and there is the railway line to the North, and from North to South it is crossed by the SS 147, connecting it to Assisi. In recent years it has become the 'town of the plains', and has accommodated many of the population coming from the centre of Assisi. The disorganised localisation of new production and service activities has transpired, due to the excellent accessibility and availability of areas.

Identification / description of the resources

Castelnuovo



Morphologies of the tissues



Overlap UTE- Catasto Gregoriano

Castelnuovo is situated on a road that roughly two thousand years ago connected Assisi with a place located where present-day Collemancio stands.

The entire route of *Petrosa*, as the road was called, can still be traced today.

The first mention of a castle in this area, referred to as *Fratticiola* and belonging to the estates of the Longobard Lupo di Monaldo, a nobleman from Spoleto, dates from 1056.

The territory is predominantly flat and used for agricultural purposes; the main crop was sorghum which was cultivated for the production and sale of brooms.

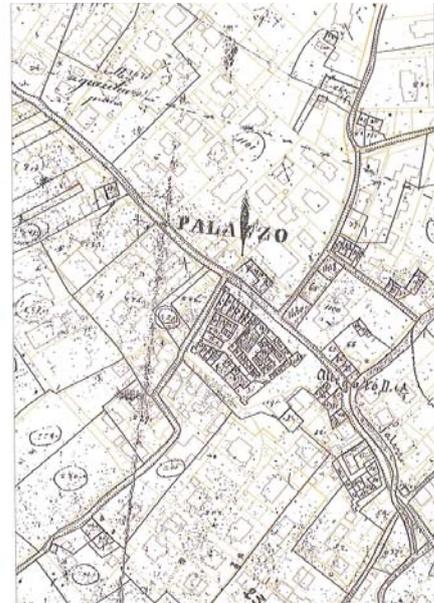


Identification / description of the resources

Palazzo



Morphologies of the tissues



Overlap UTE-Catasto Gregoriano

The hamlet of Palazzo, situated at 236 m a.s.l., grew up around the C14th Castello dei figli di Cambio, built in 1385 to defend Assisi from attacks by Perugian troops. Walls were built connecting the preexisting towers belonging to the heirs of the feudal lord, Cambio, to create a quadrilateral fortress of considerable strategic importance. The village of Palazzo prospered during the period of the Perugia-Assisi struggles, and since the 1970s dense but rather haphazard housing has sprung up around the recently-restored castle.

The problems of the hamlet can be attributed above all to the inadequacy of the existing road network, due both to the position of the hamlet and the heavy traffic coming from Petrignano.



Identification / description of the resources

Petrignano



Morphologies of the tissues



Overlap UTE-Catasto Gregoriano

The township of Petignano is situated on the flatland of the Umbra Valley, to the east of the municipal territory which borders with the Bastia Umbra territory.

The town is strongly impacted by the presence of the Chiascio River and by the heavy through-traffic. The historic buildings, the church, local businesses, services are all located in the centre of the hamlet. The castle, centre of the historical settlement, has become functionally and morphologically degraded. From an economic point of view, the town's importance in the territory has increased with the growth of its manufacturing hub. It is a town that is in the process of assuming the importance of a city in which urban expansion often occurs in a disorderly manner. The residential developments have largely been haphazard, the new building zones were not always established near the existing built-up area, as, in some cases, the initial building zones were created far from the centre. The road network is chaotic, without an overall planning framework. The town square has lost its importance as a focal point for the local community.



Identification / description of the resources

Rivotorto



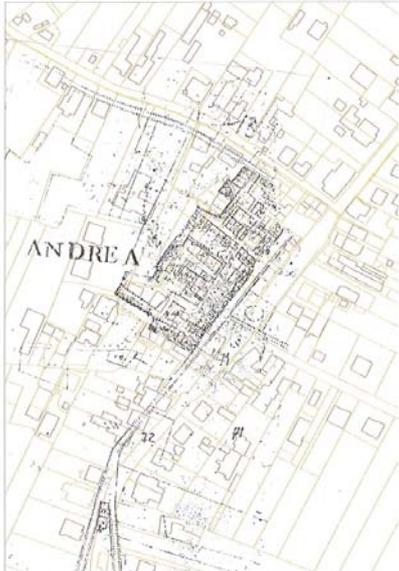
Extracted from PRG

This hamlet is famous for the Rivotorto Sanctuary that houses the Sacred Hovel, which is reported to be one of St. Francis's first 'residences'. Next to the church there is a convent with a large cloister. The hamlet is affected significantly by the SS 75 crossing over to the South. As with the other hamlets, next to the historical centre established by the Sanctuary, building construction has occurred in a disjointed fashion and without a cohesive plan. In the past farming was at the heart of business activity, especially in relation to vegetable and nursery gardening. At an industrial level, there are a certain number of businesses operating in the timber, cement and knitwear sectors.



Identification / description of the resources	
Santa Maria degli Angeli	
	
Morphologies of the tissues	Overlap UTE-Catasto Gregoriano
<p>The SS 75 road passes through it to the South and there is the railway line to the North, and from North to South it is crossed by the SS 147, connecting it to Assisi. The area which includes the Porziuncola Basilica falls within the perimeter of the UNESCO site. The face of Santa Maria degli Angeli has changed in the last thirty years due to two complementary phenomena - the massive demographic fall in the population from the centre of Assisi to the plains, and the localisation of new production and service activities, due to the good accessibility and availability of areas. As a result a 'town of the plains' has transpired, which crosses municipal boundaries and is arranged on the Perugia-Foligno thoroughfare, where the greatest flows of traffic and goods pass. This is a prestigious old district choked by traffic, with plots on the outskirts with no building quality, industrial structures of great interest for the economy in Assisi, and building projects scattered around the countryside which require a new design of cohesive rearrangement.</p>	



Identification / description of the resources	
Tordandrea	
	
Morphologies of the tissues	Overlap UTE-Catasto Gregoriano
<p>Epigraphic, numismatic and funerary evidence show that the present area of Tordandrea had human settlements as far back as Roman times. The oldest documentation on the existence of a <i>Torre d'Andrea</i> seems to date back just to 1395, the year when it was also mentioned for the first time in <i>Palazzo di Andrea</i>, whose owner, Andrea Paolo degli Abati or degli Abbati, is remembered by Frondini as “a very powerful man in Assisi who constructed a fort or small fortress on the plains of Assisi, namely a castle, and from this the name <i>Torre d'Andrea</i>”.</p> <p>However the most important fact from the first half of the 15th century in the history of the <i>Torre d'Andrea</i> concerns the battlements constructed for defence purposes in 1431, with the creation of a boundary wall, obtained by joining the external walls of the houses together to make just one structure, the castle body, the inside of which could only be accessed via one gate, which still exists, with a drawbridge and a moat surrounding the castle. As with other hamlets, 20th century expansion developed in a random fashion around the central area established by the castle. Hamlet economy is exclusively linked to farming.</p>	

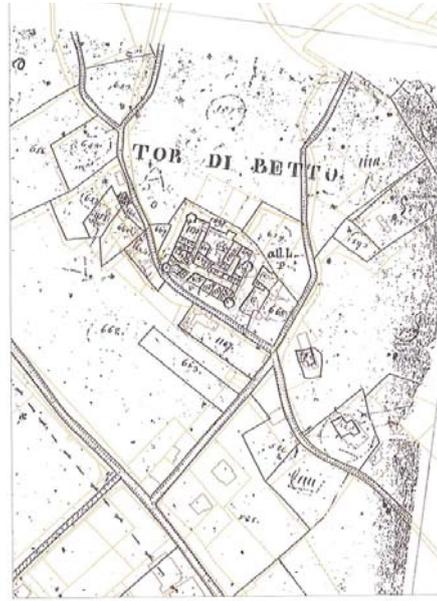


Identification / description of the resources

Tordibetto



Morphologies of the tissues



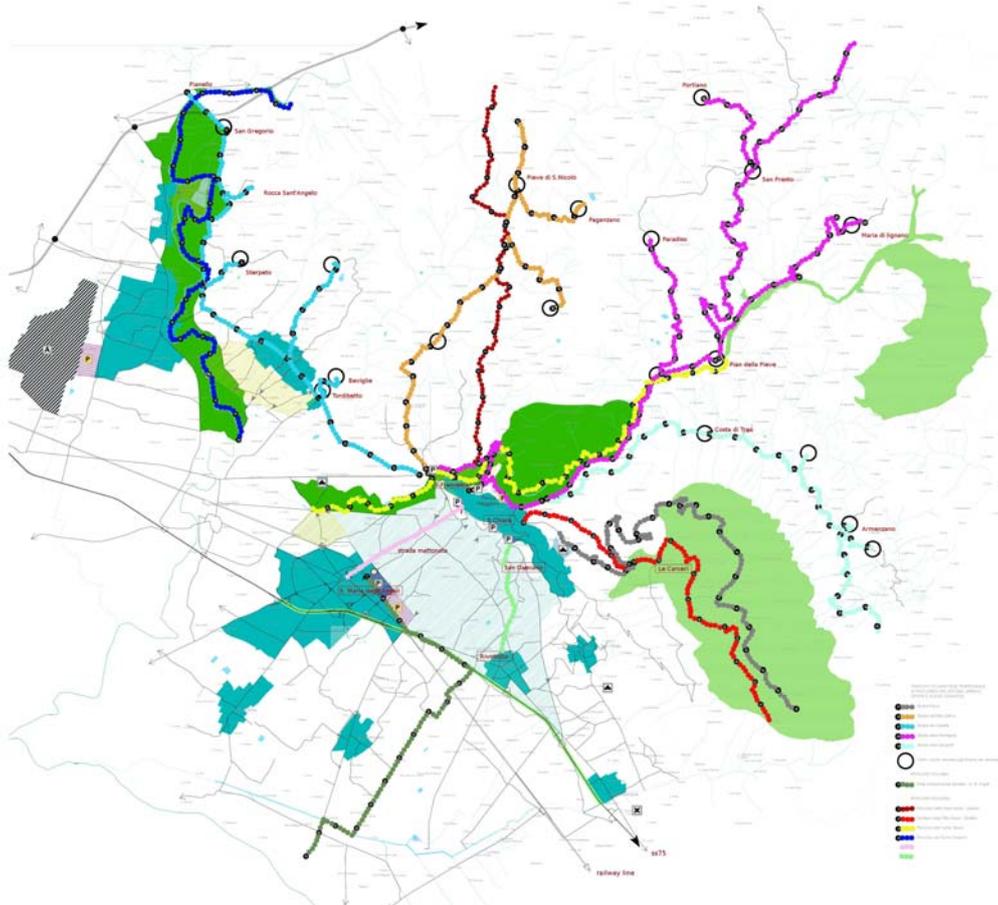
Overlap UTE-Catasto Gregoriano

This small hamlet developed from a quadrangular castle framed by four circular towers positioned to defend Assisi (around the middle of the 13th century). The walls, moat and drawbridge are still visible. The local crafts industry is famous for canvas embroidery, created with traditional Franciscan stitching. A local food speciality is *frascarelli*, a particular flour and water-based pasta. With regard to farming, the cultivation of olives and olive oil production has particular importance, along with distinct farming areas of course.



Identification / description of the resources

Tourism and pilgrimage nets



The two main hubs of religious and cultural tourism are Assisi and Santa Maria degli Angeli. A series of pilgrim/cultural trails that connect the main Franciscan locations branch off from both places.

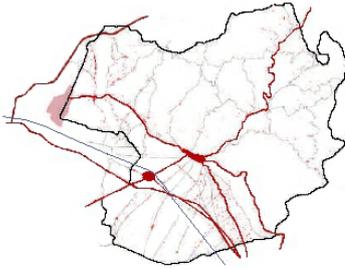
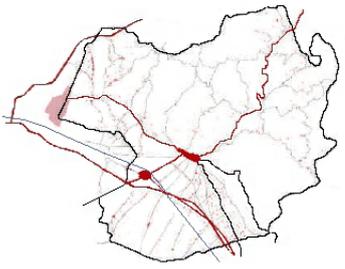
The Assisi-Santa Maria degli Angeli road (now paved with bricks) is the primary historical trail in the Franciscan itineraries as it connects the Saint's two greatest places of worship (the two Basilicas of S. Francesco and Santa Maria degli Angeli respectively), uniting them into a single pilgrim's trail.

The trail from Assisi to Gubbio is one which, according to documented sources, most likely goes along the road that led Francis from his place of birth in Gubbio in the winter of 1206, after having publicly renounced his inheritance.

The Assisi-Eremo delle Carceri trail traces the places where St. Francis and his followers dedicated themselves to contemplation and prayer from 1205 onwards.

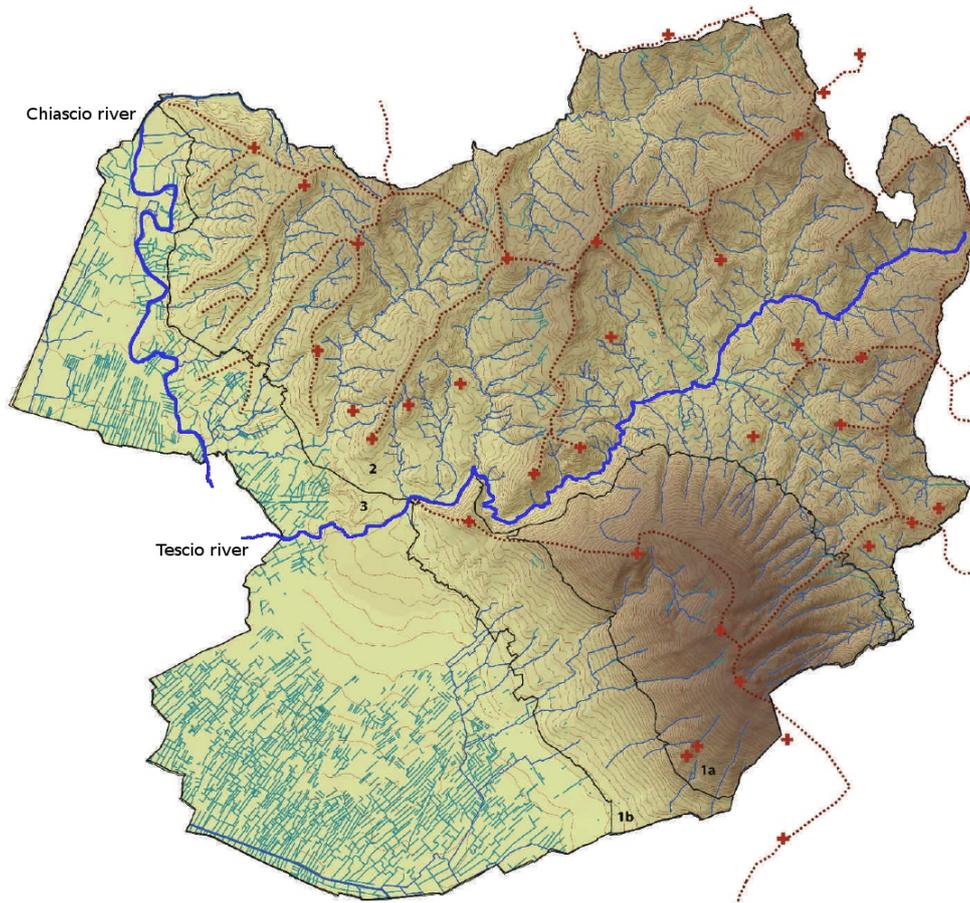
The Assisi-San Damiano trail leads to the sanctuary where St. Francis heard the crucifix speaking to him in 1205.

The Assisi-Rivotorto trail leads to the place where St. Francis, once he had abandoned a comfortable life, lived for a long time in a hovel, which constituted a low stone building covered with branches.

Description of the importance/vulnerability of the resources		
Tourism and pilgrimage nets		
	Description	Vulnerability
 <p>Cultural tourism network</p>	<p>The three main socio-economic systems relating to three different networks and types of tourism are:</p> <ul style="list-style-type: none"> - the cultural and religious tourism network, represented by routes connecting Assisi to neighbouring towns. <p>The importance of Assisi as a location connected to Franciscanism, a town of peace, a destination for pilgrims, and a town with monuments of exceptional historical/artistic value, is recognised throughout the world.</p> <p>The routes leading to and from the town pass the SS 75 road, the ring road, and the rail network.</p> <ul style="list-style-type: none"> - nature trails and walking tourism: the presence of areas with significant environmental and scenic value have given rise to the development of an extensive network of paths that connect Assisi to the main centres scattered around the hills and mountain areas. 	<ul style="list-style-type: none"> - <u>cultural network and religious tourism</u>: the system of relationships and values, clearly demonstrated by a wealth of cultural heritage, the strategic importance of Franciscan trails and sites, historical centres and locations, the widespread presence of recognised heritage of historical value, and the areas undergoing transformation, all highlight levels of criticality in terms of environmental compatibility and sustainability, and use capability. - <u>nature trails and walking tourism</u>: the system of relationships and values in the local ecological network, represented by areas of known environmental value of EU interest, highlights the need for balance between conserving ecological processes and ecosystems, and possible new economies linked to appropriate use, as a resource which can create new sustainable economies linked to new forms of employment and tourism.
 <p>Religious tourism network</p>	<ul style="list-style-type: none"> - rural tourism and local production network, relating to the development of new types of tourism connected to production activity (agritourism). This type of production and activity is scattered throughout the area of Assisi. 	<ul style="list-style-type: none"> - <u>rural tourism and local production network</u>, linked to the system of relationships and values of current and potential economies represented by quality production in hill areas and on the plains.

Identification / description of the resources

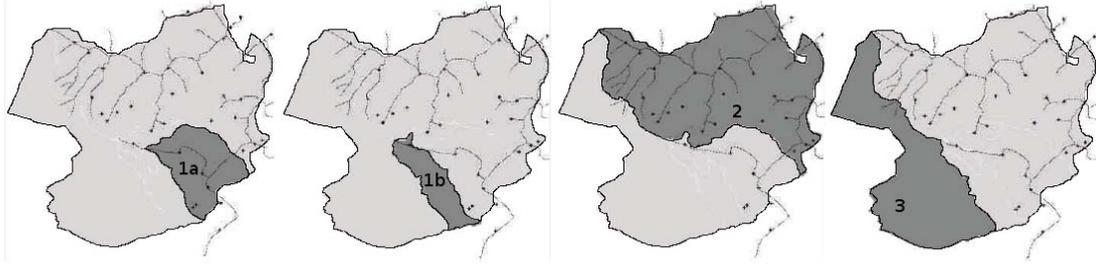
Physical-naturalistic resources



The municipal territory of Assisi extends over a total area of 18,880 hectares and includes three main geomorphic areas:

- 1a.** The calcareous mountain of Subasio, with almost all of the Subasio mountain complex and its peaks;
- 1b.** The piedmont side connecting to the Umbrian valley below;
- 2.** The internal overlooking hill, characterised by the extensive hydrographic network of the Chiascio and the Tescio;
- 3.** The Umbrian valley, equivalent to approximately 30% of municipal territory, marked by the two rivers and the network of drainage ditches.

From a hydrographic point of view, the area forms part of the Tevere river basin, and the main watercourses are the River Chiascio, which crosses municipal territory from North to South in the hamlets of Torchiagina and Petrignano d'Assisi and its tributary, the River Tescio, which flows towards the built-up area of Assisi from Maestà, crossing the entire municipal territory from East to West. The hydrographic network of the River Tescio (the main one for the municipal area) comprises various gullies, often with seasonal capacity (Oppico, Marchetto, Cavaliere, the Rio, Anna, Vettoio and Renaro), which descend down the sides of the Subasio massif and merge into the torrents of the valley floor, and numerous watercourses that intersect the elevations of the hilly region.

Identification / description of the resources
Physical-naturalistic resources

Zona 1a - The calcareous mountain of Subasio Zona 1b- The piedmont side connecting to the Umbrian valley below Zona 2 - The internal overlooking hill Zona 3 - The Umbrian valley



Area 1a



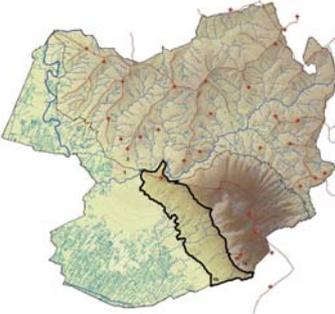
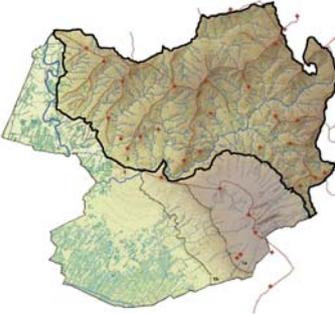
Area 1b

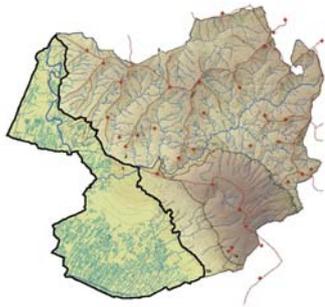


Area 2



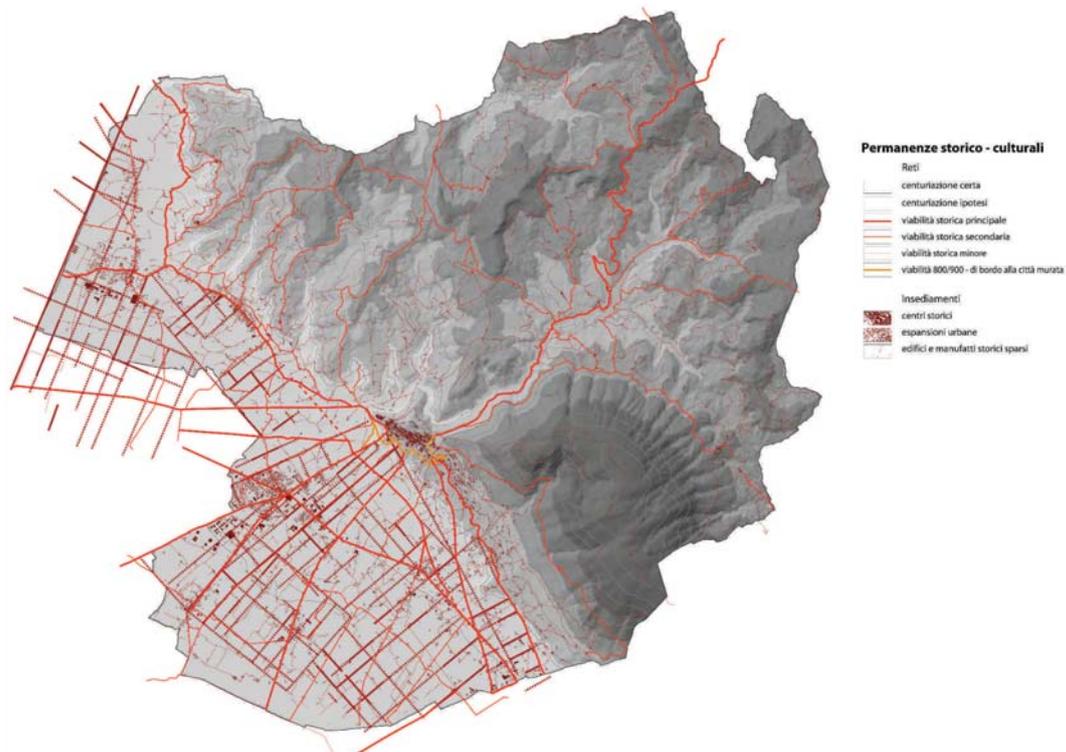
Area 3

Description of the importance/vulnerability of the resources		
Physical - Naturalistic resources		
	Description	Vulnerability
 <p>Zona 1a</p>	<p>Area 1a – High mountains of the Subasio</p> <p>The high mountains of the Subasio, including the similarly named Regional Park within, extend to the East of the town of Assisi, from a height of 600 m to 1290 m above sea level, including the entire calcareous massif dominating the Umbrian valley below. The morphology is marked by the sequence of the four peaks of Colle di San Rufino (1270m), M.Subasio (1290m), M.Civitelle (1270m) and La Sermolla (1192 m). The background is characterised by a unique combination of landscape coinciding with the morphological emergence of the massif, with a ridge that is 6 km wide and approximately 16 km long. The karstic forms present on Mount Subasio represent some of the most interesting in terms of landscape.</p>	<p>Area 1a</p> <p>The eastern side, with uniform inclination, has erosion and landslide phenomena; the western side is steeper and scored with deep cuts produced by gullies such as the Carceri, liable to particular erosion phenomena.</p>
 <p>Zona 1b</p>	<p>Area 1b – side connecting with the Umbrian valley, includes landscapes P3.2 - landscape of the walled city and modern expansion and P3.3 - landscape of the terraced slopes of Asio and Subasio. This is the area most greatly affected by fluvial processes. The western side is scored with three main gullies (Fosso delle Carceri, Roseto and Renaro). The valleys are narrow and V-shaped.</p>	<p>Area 1b</p> <p>Instability due to deep water circulation is often the cause of slipping landslide and erosive phenomena, particularly marked in the area between Porta Cappuccini and the area of San Damiano.</p>
 <p>Zona 2</p>	<p>Area 2 – the facing hills</p> <p>Includes landscapes P2.1 - agricultural, farming and shepherding landscape of the middle valley of Tescio, landscape P2.2 - agricultural-forestry landscape of environmental inter-connections and landscape P3.1 - landscape of the secondary ridges and resting castles</p> <p>The morphology is mainly hilly with slopes that have an upper convex part, in relation to permeable rocks (sand and sandstone), and a lower concave part, in relation to impermeable detritus</p>	<p>Area 2</p> <p>The numerous anthropic ploughing processes with techniques and procedures that do not provide for water flow regulation in a very sensitive area, form slump areas next to layers with different geotechnical behaviour.</p>

Description of the importance/vulnerability of the resources		
Physical - Naturalistic resources		
	Description	Vulnerability
 <p>Zona 3</p>	<p>Area 3 – the Umbrian valley</p> <p>Includes Landscape 4.1- The landscape of the mid-valley and the fluvial terraces of the Chiascio, which is a configuration element significantly marked by the presence of the watercourse.</p> <p>Landscape 4.2 - The landscape of the irrigation plain under transformation.</p> <p>Landscape 4.3 - The landscape of the low valley of the Tescio and the dry plain.</p> <p>Landscape 4.4 - The landscape of the irrigation plain of the Ose and the Renaro.</p> <p>In addition to natural watercourses there are also numerous drains of anthropic origin, often with pipework, which have the task of preventing backwater and rain wash. The River Chiascio runs behind the hilly layout between Torchiagina and Petrignano, then makes its way south in the Umbrian valley. The direction of flow is from North to South. The River Tescio has a hydrographic basin that develops to the North of the Subasio. The direction of flow is from Northeast to Southeast, the overall pattern is characterised in uphill areas by deep valleys and sub-vertical walls, in the intermediate area by more open valleys with small river flats.</p>	<p>Area 3 – the Umbrian valley</p> <p>The change in farming practices, urbanisation which is often uncontrolled, and the creation of new infrastructure and services threaten the delicate hydrogeological balance of the main torrents and their tributaries significantly. From an agricultural point of view, land suitable for planting trees has been replaced with simple arable land, and with this a large part of related agricultural systems have disappeared, including drains which have been closed in many areas. This transformation has entailed an extension in average field dimensions and a reduction in their boundary elements.</p>

Identification / description of the resources

Historical-cultural resources



Assisi represents an example of remarkable permanence of its natural and anthropic constituent elements - settlements (suburbs, castles, villages), isolated religious constructions (churches, monasteries, retreats) and civil constructions (towers, villas, farms, mills), road layouts (centuriation, consular roads, farm roads), traditional agricultural crops (olive groves, vineyards, tree-planted land, irrigation land), agricultural layouts (plantations, 15th-19th century drainage systems).

In addition to the old road system, which is mainly of Roman origin and still defines the entire area, there is also the main thoroughfare comprising the SS75 dual carriageway.

The construction of this dual carriageway, aimed at improving mobility between valley centres in the province and the E45 state road, has produced a high concentration of production and business activity along the surrounding areas.

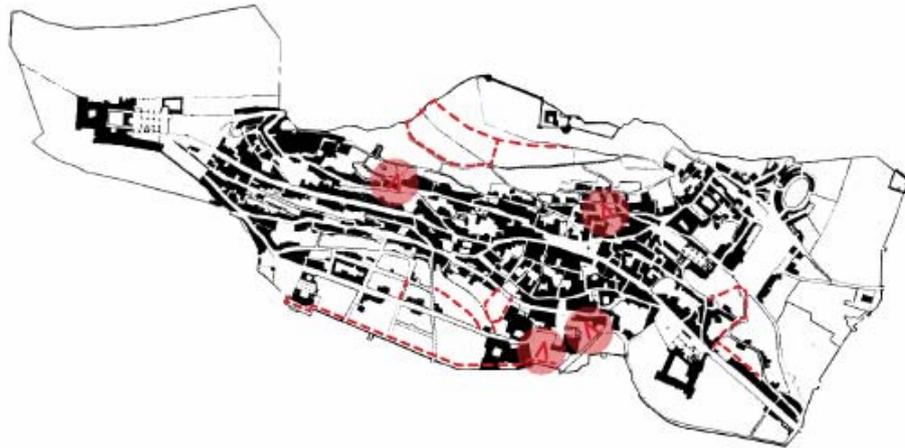
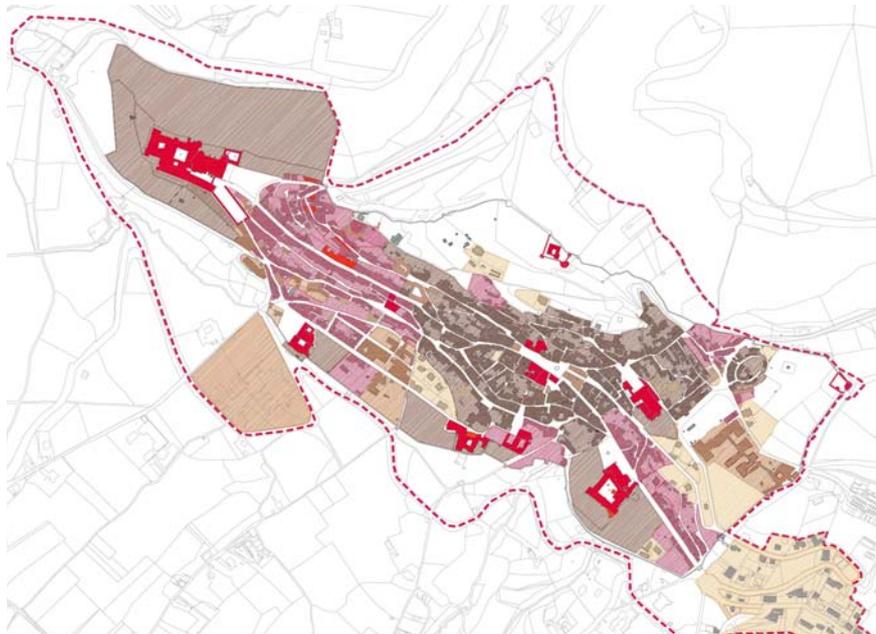
Identification / description of the resources

The walled city - green spaces



Identification / description of the resources

The walled city - tissues morphology



In the first half of the 19th century urban space was still contained purely within the medieval perimeter walls, and any green areas are those outlined on 16th century maps; the only significant changes relate to the presence of aristocratic buildings from the Baroque era and regularisation, though limited, of important roads which were constructed over the centuries. After the remains of Francis were found, worship of the saint spread quickly, with a resulting increase in tourism which led to the growth of accommodation in the old town - the range of new constructions started in 1870

Methodological approach to the conservation of HUL: the case of Assisi

with Hotel Subasio, between Porta S. Francesco and the pilgrims' portico in the square under the Basilica. The increase in tourists and traffic posed the problem of how to re-organise the road system to make it easier for carriages to reach various points in the town. As a result it was decided that a new road would be built, the present Via S. Gabriele dell'Addolorata, to improve circulation between Piazza del Comune and Piazza Nuova. This involved the demolition of the section of houses on the eastern side of Piazza del Comune, situated between Via Ceppo della Catena and Via di San Rufino. The public gardens in the area northeast of the town were another symbol of the new era.

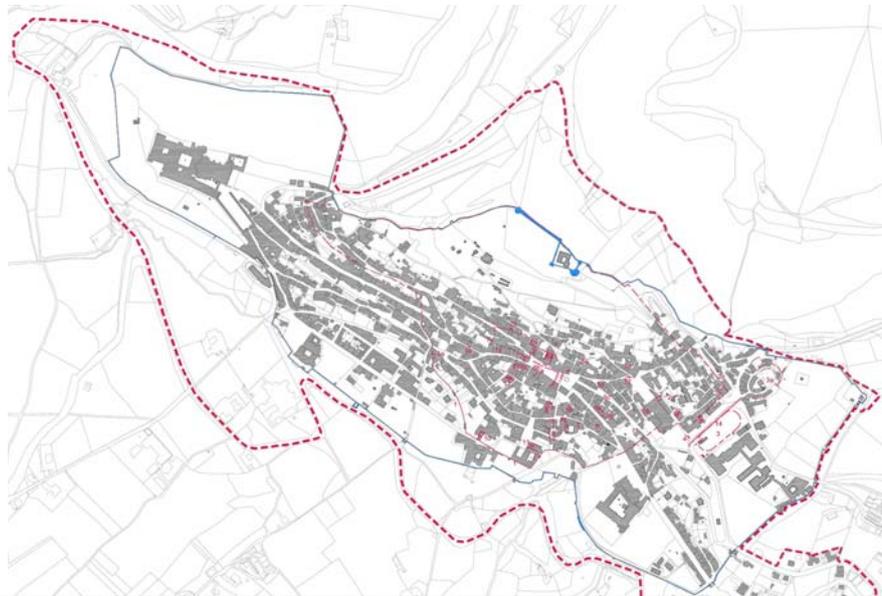
The built-up area was bordered by the 14th century walls, which still contain wide green spaces. The first initiatives started in the area during this period, in relation to the construction of the railway, which on one side cut through the ancient medieval network of roads leaving Assisi and going towards the valley, impacting direct relationships between the town and its most productive farming area, and on the other side increasing the importance of Santa Maria degli Angeli as a location on the plains through which various main connections between the area to the North and South of the railway could pass. In the first half of the 20th century demolitions and reconstructions were carried out which involved the pre-modern fabric of Assisi after the First World War - the demolition of the ancient San Nicolò Church situated on the western side of Piazza del Comune, which was replaced with the building destined to house the Post Office, and the restoration of the northern area of the old town with the construction of the national boarding school.

After the Second World War, and following new regulations to protect urban heritage with regard to the town, and landscape restrictions applied to the whole territory and restrictive regulations in the General Town Planning Scheme which imposed a no-building constraint around the historical centre within a radius of 2 km from the town walls, there were limited changes until recent years in this important town, which witnessed limited development in the area to the East, under the Subasio.



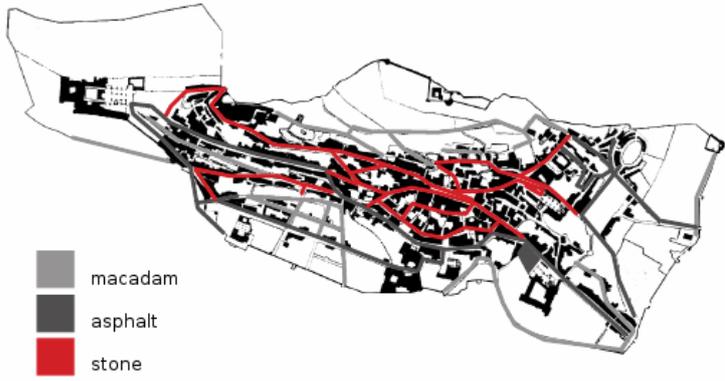
Identification / description of the resources

The walled city - archaeological persistence



The first traces of the site being frequented date back to the Bronze Age and the First Iron Age, and come from the area around the Rocca, whereas the ruins of a sanctuary on S. Rufino hill and structures along Via Arco dei Priori date back to the Archaic Period. The Roman town in Umbria, whose structure adapts to the natural slope with the construction of monumental terraces, occupied the same site as the medieval town. There is little evidence from documentary sources on the history of the centre, which was probably self-governing until the Social War, after an alliance treaty with Rome at the beginning of the 3rd century BC. The uneven square boundary wall, which remains in various sections, dates back to the 2nd century BC. Once it became a municipality after 90 BC, the town underwent obvious urban development which had its political and religious heart in the area of the *Foro* and the *Tempio della Minerva* on the central terrace, dating back to the 1st century BC and most likely dedicated to the *Dioscuri*. During the Augustan and Imperial Age the prosperity of the centre was illustrated by numerous monuments - the large tank under S. Rufino, the theatre and amphitheatre, the Moiano nymphaeum monument, in addition to two exceptional domus structures, with mosaic flooring and wall paintings, one under S. Maria Maggiore, belonging to the Latin poet Propertius according to folklore, and the other discovered more recently under Palazzo Giampé, dating back to the first half of the 1st century AC.

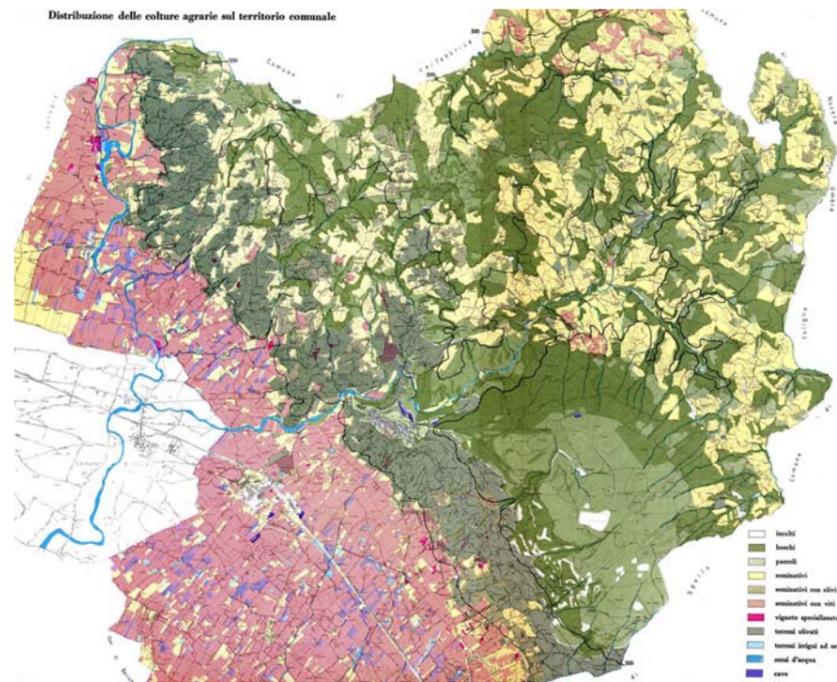


Identification / description of the resources
<p>The walled city-roads</p>
 <p>A map of Assisi, Italy, showing the layout of its walled city-roads. The map is color-coded to indicate different road materials: grey for macadam, dark grey for asphalt, and red for stone. A legend in the bottom-left corner identifies these colors. The stone roads (red) form a complex network throughout the city, while macadam and asphalt roads are also visible.</p>
<p>Assisi, with its special historical, cultural and religious characteristics, is characterised by movement which is significantly distinct due to user categories and reasons for moving around. Apart from local and residential mobility, which is relatively constant throughout the whole year, three main types of mobility demand can be identified, in relation to tourist/pilgrim movement:</p> <ul style="list-style-type: none">- the highest demand category, in the months of April (Easter), May (Calendimaggio event), August, September and October (S. Francesco);- the medium demand category in the months of March, June and July;- the lowest demand category, from November to February. <p>Response to the demand of tourist accessibility with private vehicles is flexible, and tailors demand to supply through the more or less frequent closure of Assisi to tourist vehicle traffic, which is implemented with an information system that selects and directs entering traffic flows.</p> <p>Parking provision is tailored to low and medium mobility demands with the expansion of the parking system at the top of the historical centre of Assisi and in Santa Maria degli Angeli. During the highest period of tourist demand a solution is provided by the park and ride system, also situated in neighbouring municipalities, with a public shuttle bus service, with limits on direct access using private vehicles.</p>

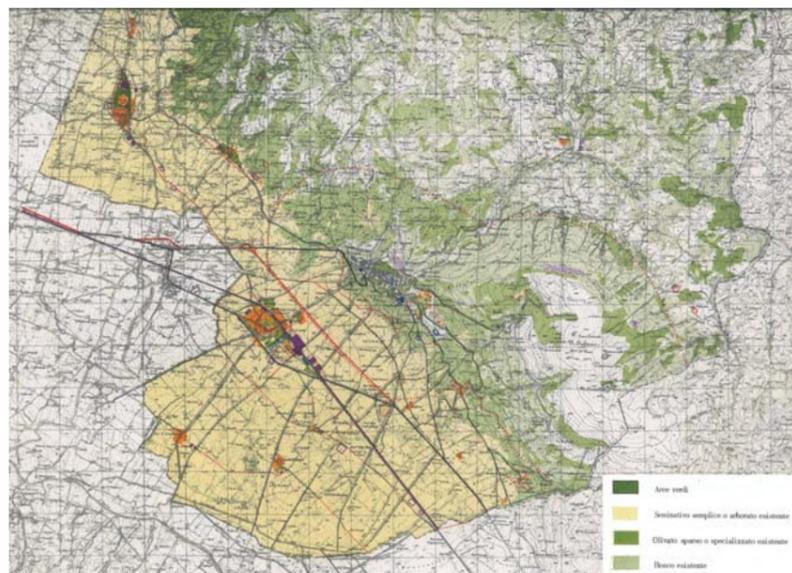


Identification / description of the resources - **Social-Functional Integrity**

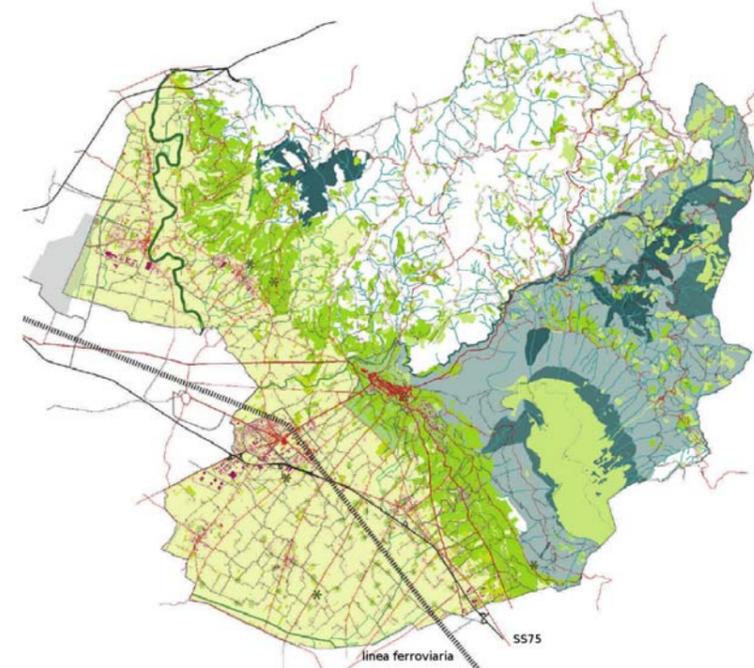
General crops



G.Astengo, 1958 Assisi General Plan



G.Astengo, 1966 Assisi General Plan (source: Archivio Progetti IUAV)



2011 Assisi General Plan

The plains represent the image of the territory of Assisi in which the historic occupation of the land has recorded the conversion of the uses of sowed with trees and simple sowed. Settlement, residential and production pressure, above all concerning the urban centres along the main infrastructures crossing the territory and connecting up with the regional roads (motorway) which now merge centres that were once isolated.

Monte Subasio and the hills facing out over it along the whole of the Pedemontana belt of the slopes of Monte Subasio and Asio and along the secondary peak system at the edges of Chiascio, cultivated from the Middle Ages through to today, still play an essential cultural role.

In the landscape of the terraced slopes of the Asio and Subasio, the consolidated use of the land sees a virtually constant presence of olives, specialised in terraced or stepped arrangements.

In the landscape of the medium valley and river terraces of Chiascio, use of traditionally tree-sowed soil has been replaced by simple sowing and with it many of the elements of connected agricultural arrangement have also disappeared. The landscape of the transforming irrigation plain (Petignano, S.M.degli Angeli, Rivortorto, Palazzo, Capodacqua, etc.) consists of a series of separate units that show transformation dynamics that have speeded up in recent years.

The originally different settlement system (tower, castle, sanctuary) and of very small size has been modified over time, particularly after the second world war. The internal agricultural areas, traditionally sowed with trees, are today virtually replaced by simple sowing or abandoned, but they remain an important component of the distinctive nature of these settlements;

The landscape of the low valley of Tescio and the dry plain is one of the territory's most significant configurative units. It includes the vast plain underlying the walled city. The settlement system of the sparse division also characterises this unit, which still today sees great persistence of its original layout of the landowner's home and/or isolated farms, also by virtue of the provisions envisaged by the Astengo PRG by way of protection.

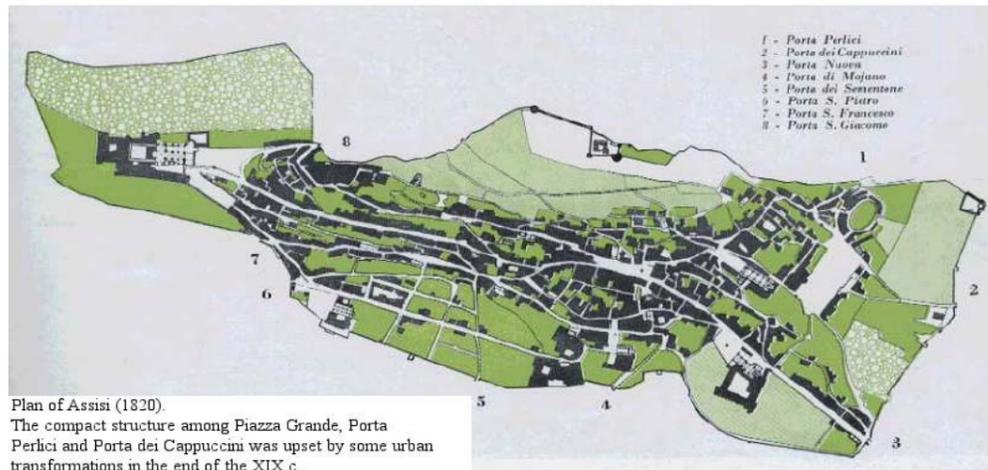
Agricultural areas, traditionally sowed with trees, are almost entirely replaced with simple sowing. The trees do, however, remain in long rows along ditches or roads, in pairs marking road crossings or at the entrance to the landowner's house, thereby helping ensure recognition of the distinctive historic nature of this landscape;

The landscape of the irrigation plain of the Ose and Renaro is the unit that is most characterised by the persistence of agricultural activities with numerous examples of country homes and isolated rural farms and a close-knit network of channels and ditches for drainage with trees in lines of reclamation to reinforce the banks; this system is very much influenced by the attraction of the belt of settlement concentration which risks the conservation and optimisation of the territorial and landscape structure produced over time by agricultural reclamations.

The comparison between the 1958 Astengo PRG and the current PRG shows how the Assisi territory retains great integrity in terms of land use. The woody areas of Subasio and the hilly belt remain, in fact, as do the olive cultivations at the foot of the hills and the sowed areas in the plains.

Identification / description of the resources - **Structural Integrity**

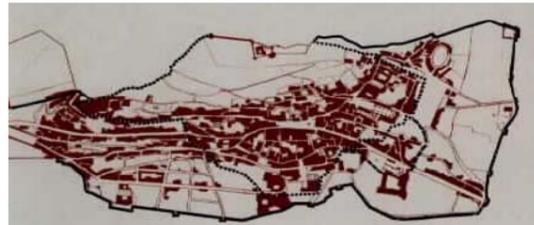
The city inside the walls



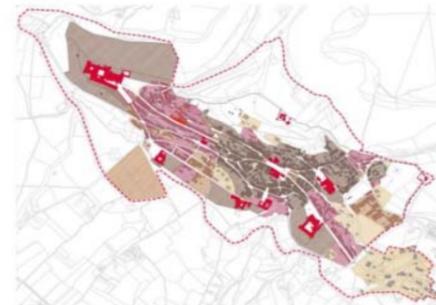
Plan of Assisi (1820). The compact structure among Piazza Grande, Porta Perlici and Porta dei Cappuccini was upset by some urban transformations in the end of the XIX c.



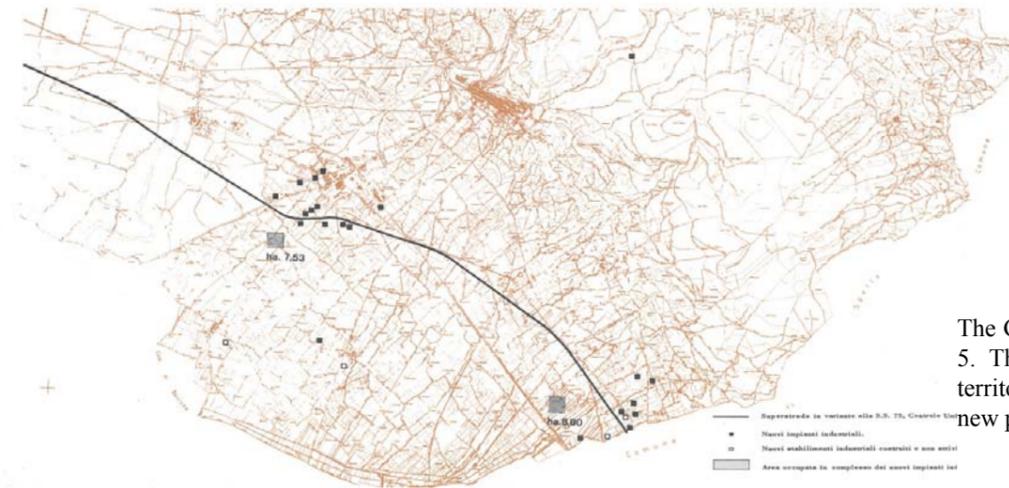
The study by Brizi on the Archaeological Roman remains (1908).



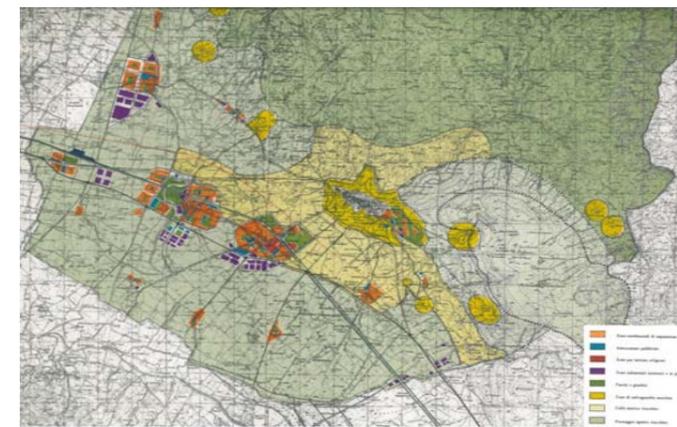
The study of Assisi walls by P. Bracaloni. The dots indicate the Umbrian-Roman walls, the dashes line indicates the walls of 1260, the continuous line indicates the walls of 1316. (Bracaloni, 1914).



The 2011 Assisi urban structure.



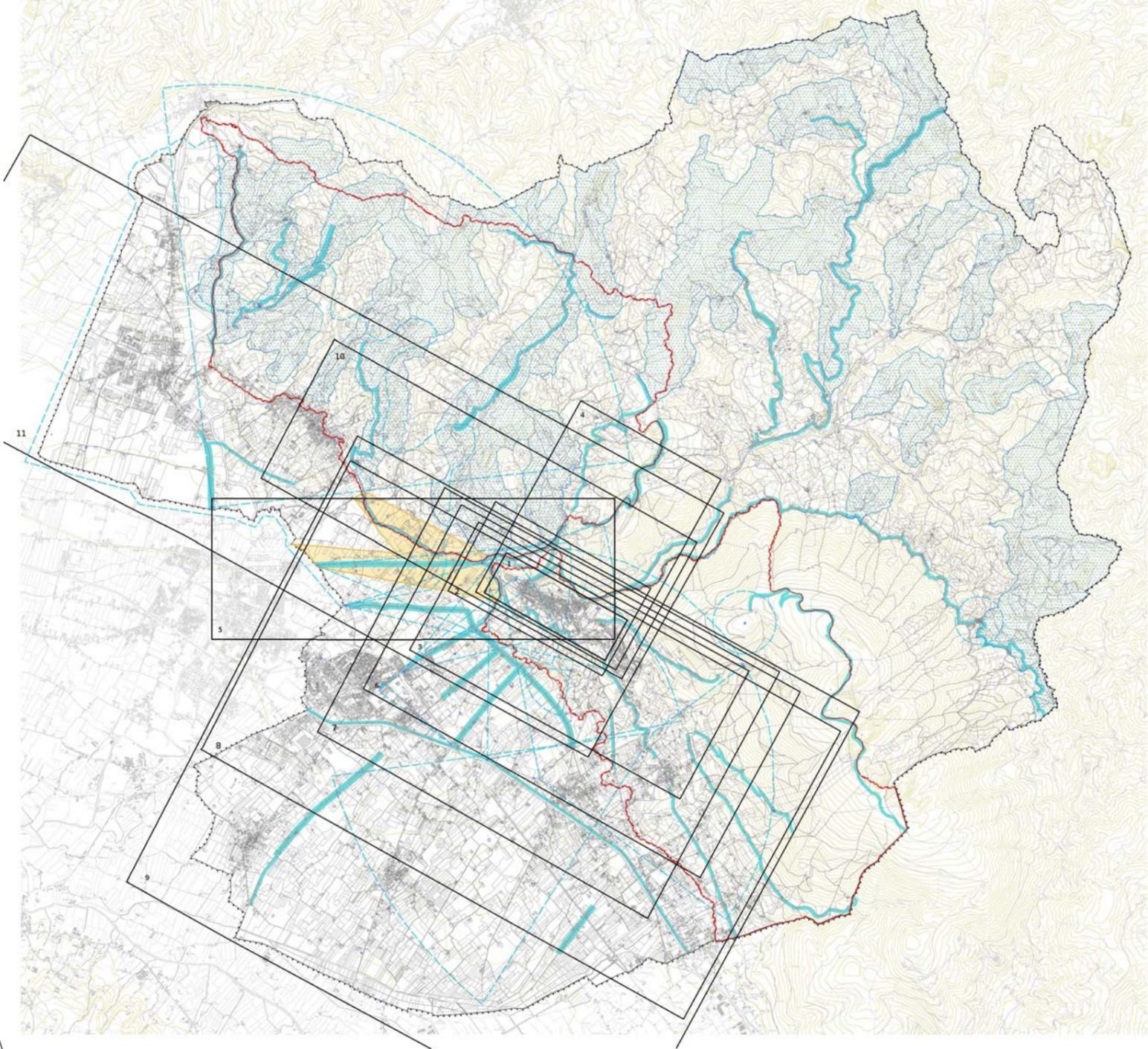
The G. Astengo 1966 General Plan, Table 5. The structural transformations of the territory between 1958 and 1966. The new project of the S.S. 75.

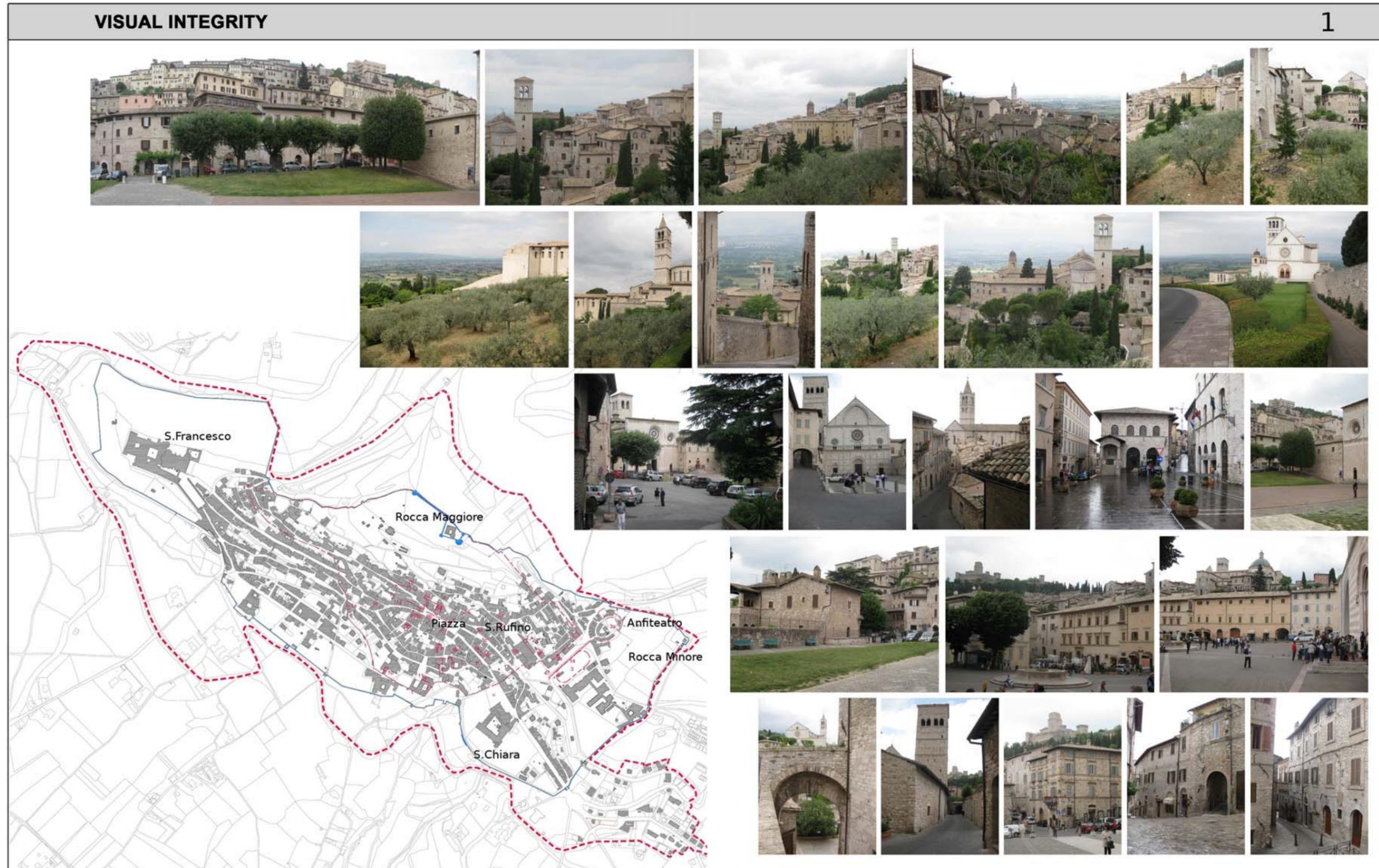


The 1966 Assisi and Bastia Umbria General Plan, Table 12

The city within the fourteenth century walled belt retains its urban structure virtually unaltered. Simply consider that Assisium, Roman municipality, had the forum exactly in the current Piazza del Comune: the urban barycentre has therefore remained unchanged over two thousand years. And much of the layout of the roads accessing the forum piazza has also remained unchanged: via Portica, which connected the forum to the urban gateway encompassed into palazzo Fiumi-Roncalli, via Ceppo della Catena, now via Mazzini, from the forum and the gate entering piazza S. Chiara and finally via di Porta Perlici between the forum and the urban gateway, as well as the layout of some stepped paths.

As concerns the city outside the walls, this has instead undergone major change: the development of the railway (1865—1870) gave rise to the first fragmentation of the Assisi plains. In the 1960s, the variant to SS 75 split the centre of S. Maria degli Angeli in two and dismembered the landscape close to Santuario di Rivotorto. The disorderly construction of the districts that took place in recent decades has given rise to an urban landscape that has lost much of its true identity.

Identification/description of the resources - VISUAL INTEGRITY	Subdivision of land in Areas
	<p>AREA 1:</p> <ul style="list-style-type: none"> • the walled city • views from the walled city • landmarks <p>AREA 2</p> <ul style="list-style-type: none"> • outside the walled city <p>AREA 3</p> <ul style="list-style-type: none"> • hilly strip and at the foot of the hills behind the walled city <p>AREA 4</p> <ul style="list-style-type: none"> • hilly strip behind the walled city <p>AREA 5</p> <ul style="list-style-type: none"> • hilly strip to the west of the walled city <p>AREA 6</p> <ul style="list-style-type: none"> • the plains from SS 75 to S. Maria degli Angeli <p>AREA 7</p> <ul style="list-style-type: none"> • S. Maria degli Angeli and the plains after SS 75 <p>AREA 8</p> <ul style="list-style-type: none"> • the plains towards Castelnuovo <p>AREA 9</p> <ul style="list-style-type: none"> • low Assisi plains <p>AREA 10</p> <ul style="list-style-type: none"> • the strip at the foot of the hills to the west of the walled city <p>AREA 11</p> <ul style="list-style-type: none"> • the far west are of Assisi



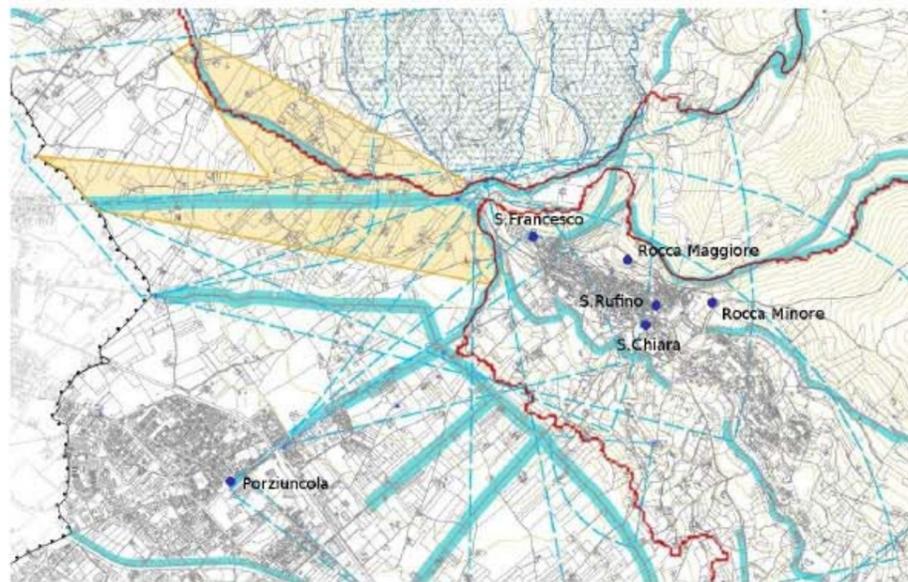
VISUAL INTEGRITY **1 - from the 'Rocca maggiore'**

The collage consists of several elements:

- fascia collinare verso il Subasio**: A photograph showing a hillside with a stone tower and a village below.
- la pianura assisiana**: Two panoramic views of the Assisi plain, showing the city and surrounding fields.
- la pianura e la fascia pedecollinare**: A wide panoramic view of the Assisi plain and the surrounding hills.
- la zona collinare**: A panoramic view of the Assisi hills, showing the city and surrounding fields.

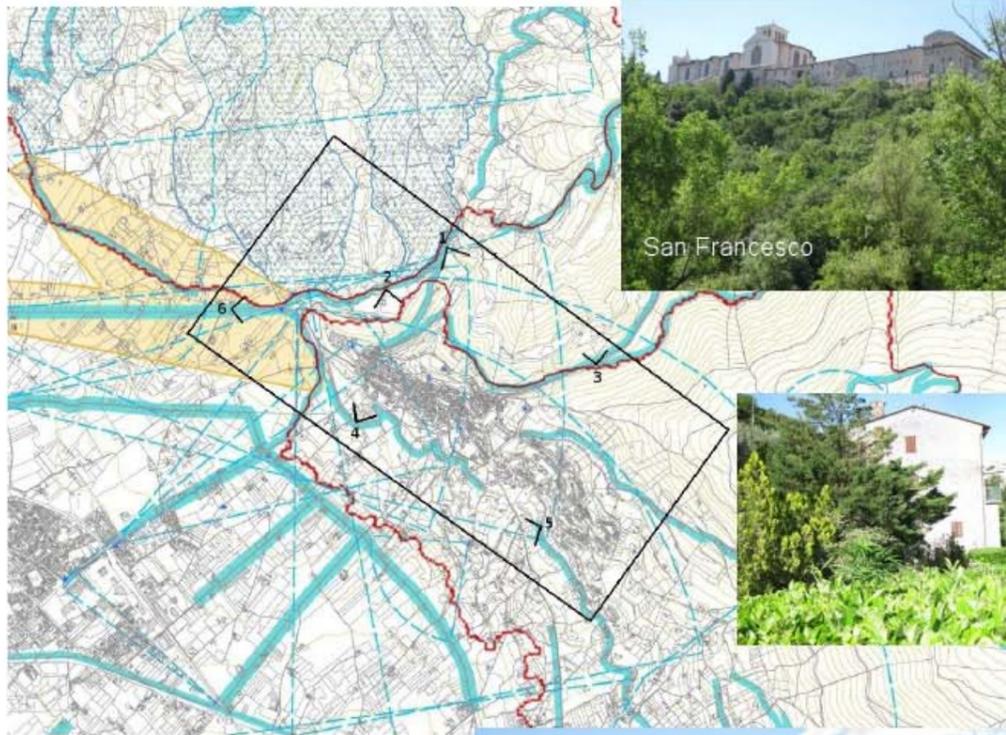
VISUAL INTEGRITY

LANDMARKS



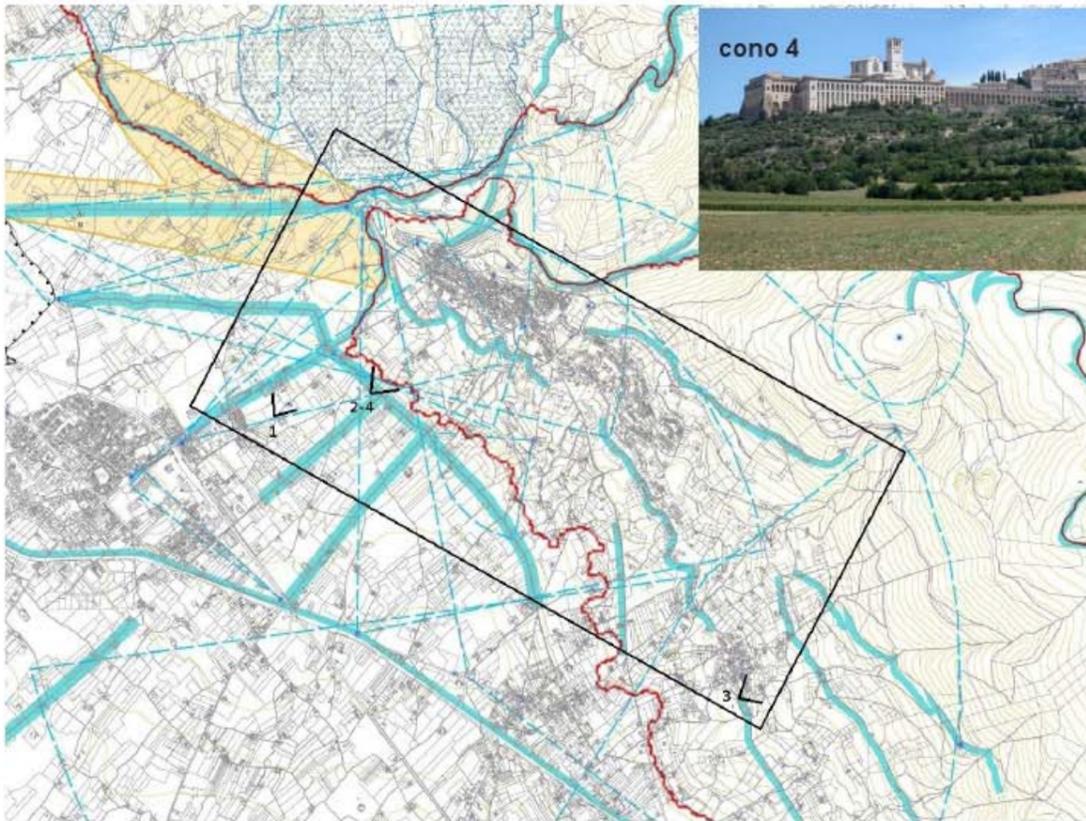
VISUAL INTEGRITY

2 - under the walled city



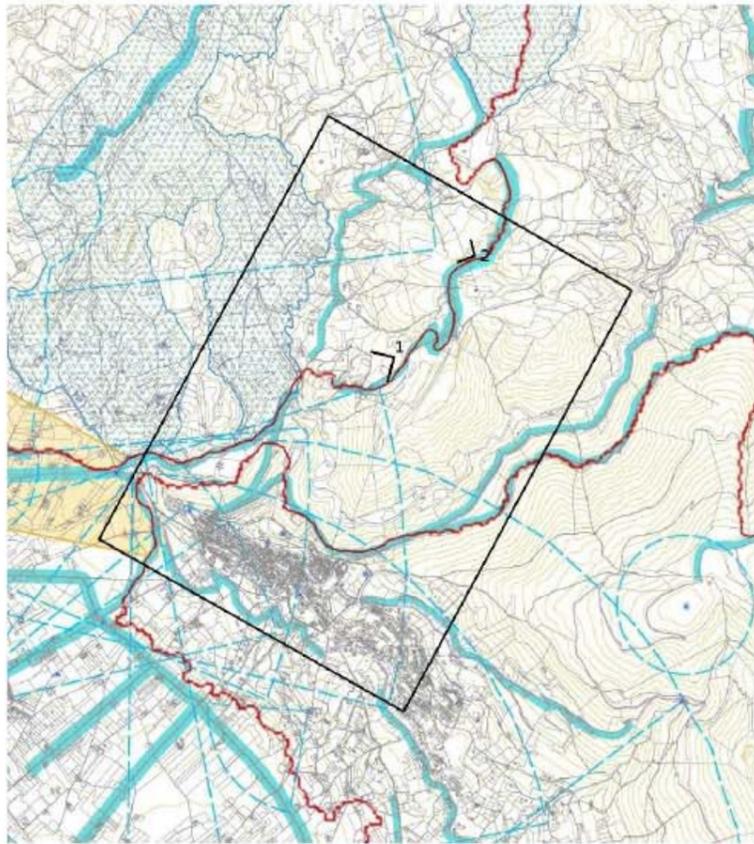
VISUAL INTEGRITY

3



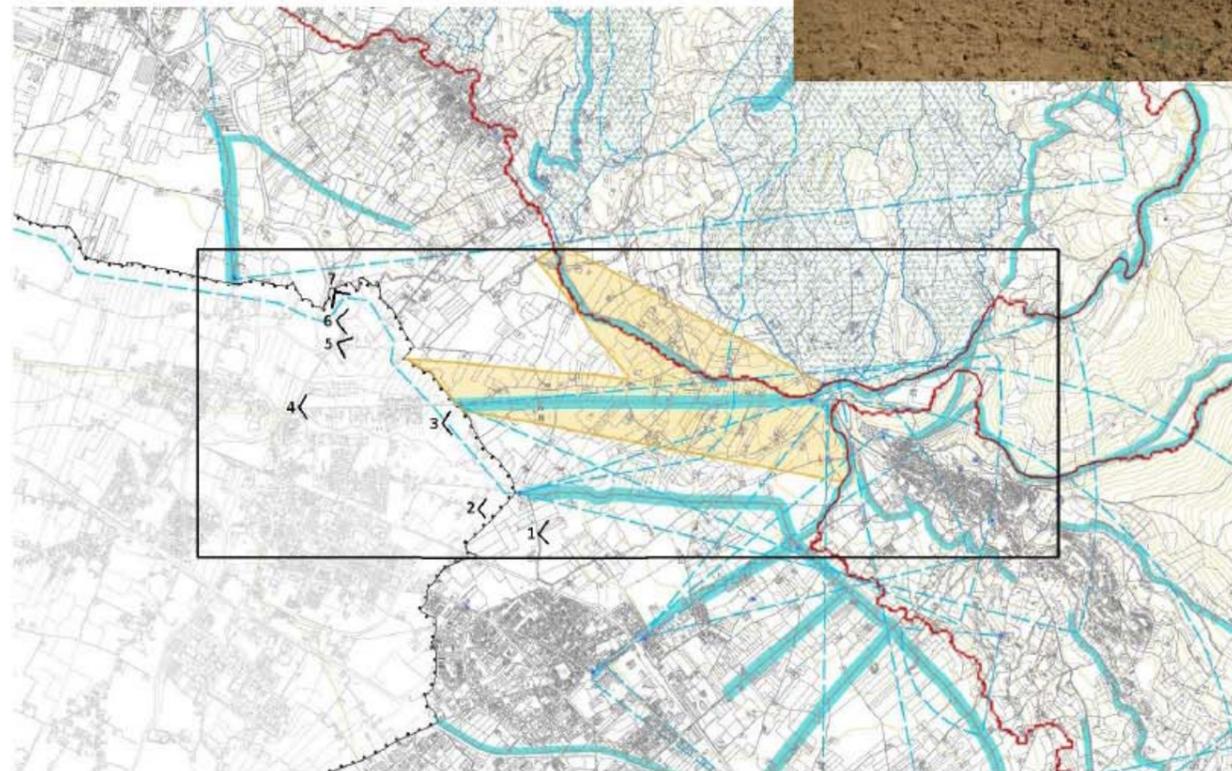
VISUAL INTEGRITY

4



VISUAL INTEGRITY

5



VISUAL INTEGRITY **6**

cono 1

cono 2

cono 4

cono 6

cono 7

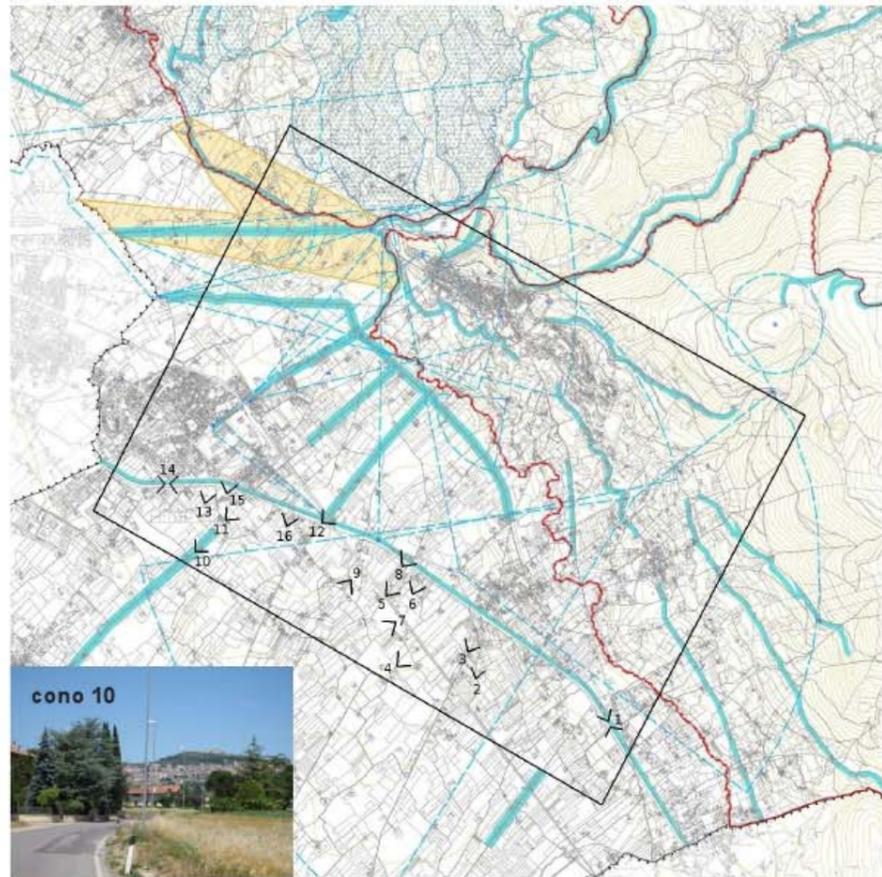
cono 8

cono 5

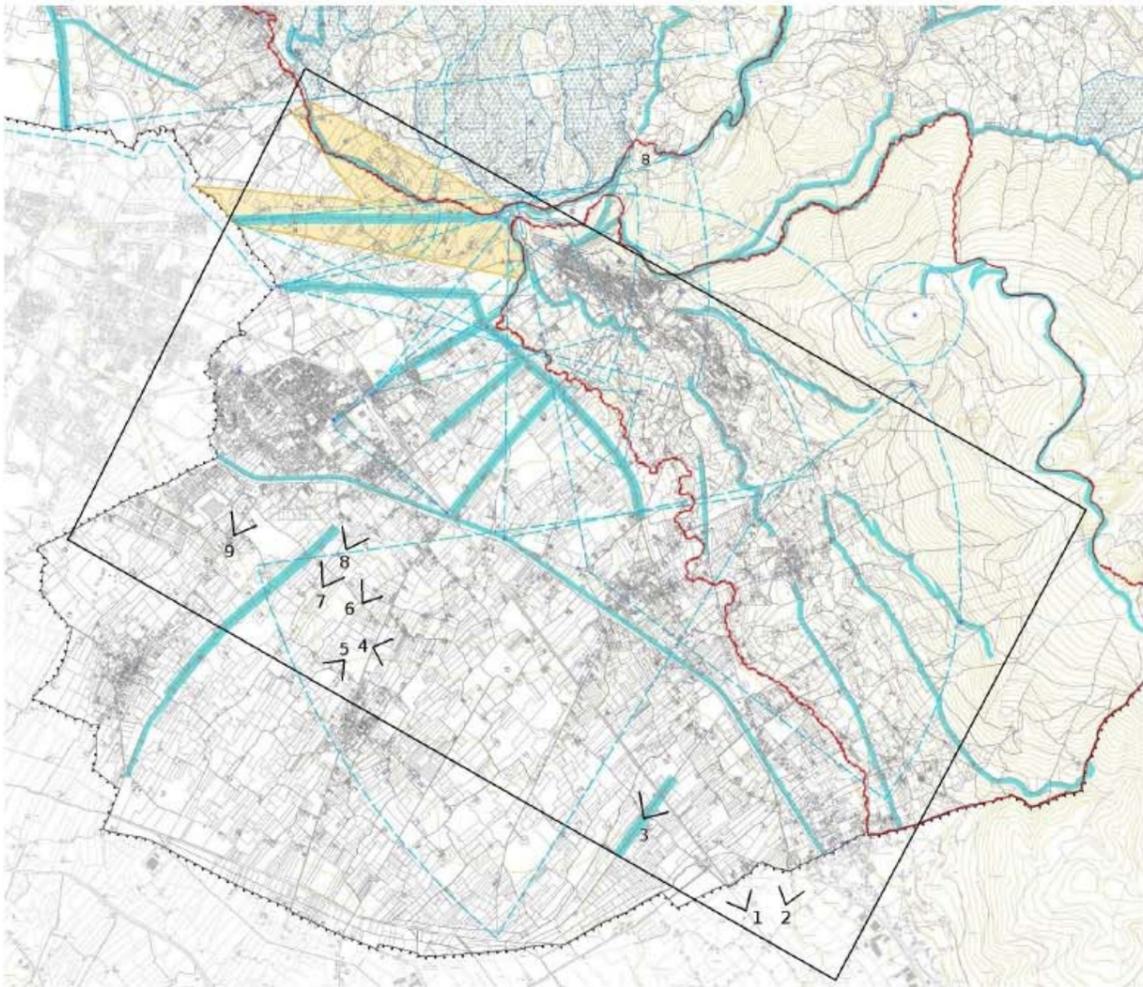
cono 3

VISUAL INTEGRITY

7



VISUAL INTEGRITY **8**



The map shows the town of Assisi with a grid of streets and a network of roads. Nine specific locations are marked with numbered arrows: 1 and 2 are at the bottom edge; 3 is on the right side; 4, 5, 6, 7, 8, and 9 are clustered in the central urban area.

cono 1


cono 2


cono 3


cono 4


cono 5


cono 6

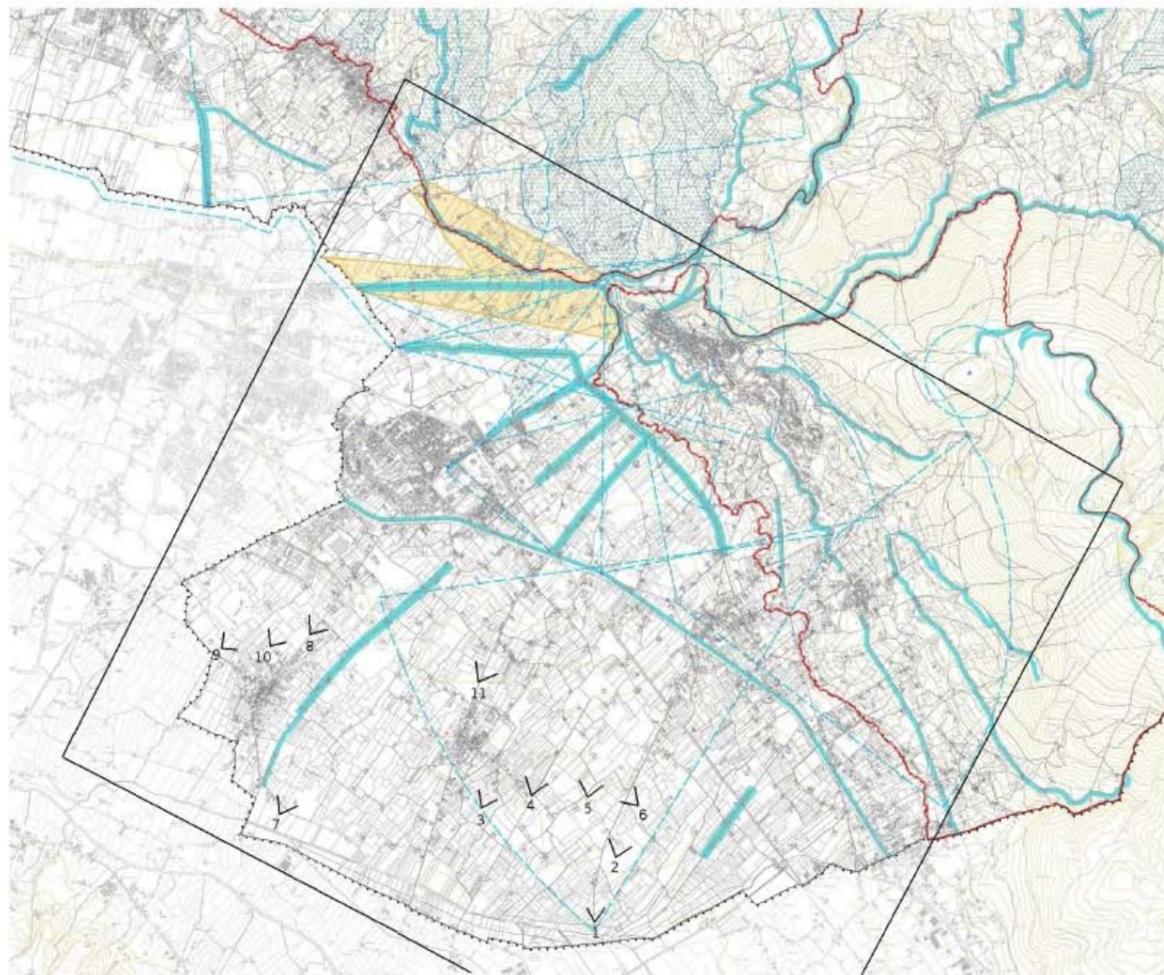

cono 7


cono 8


cono 9

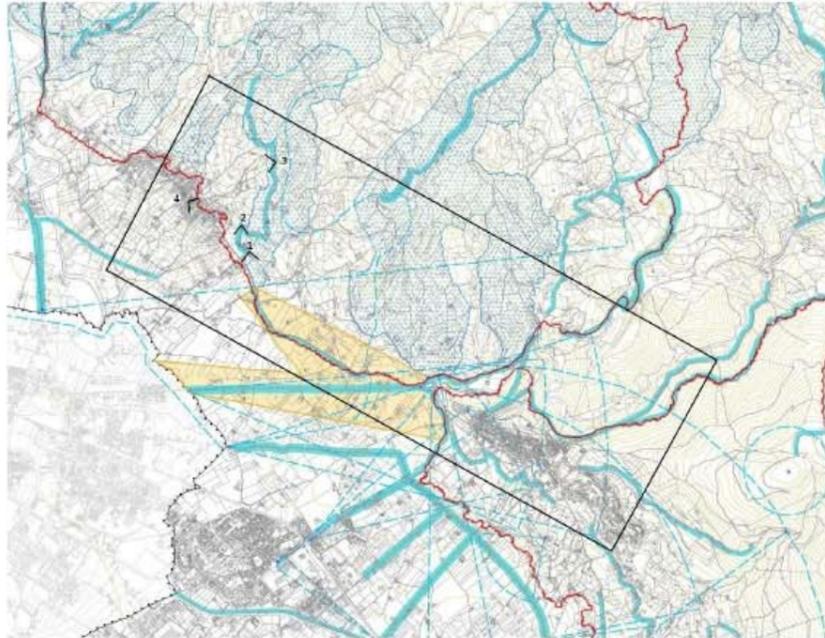

VISUAL INTEGRITY

9



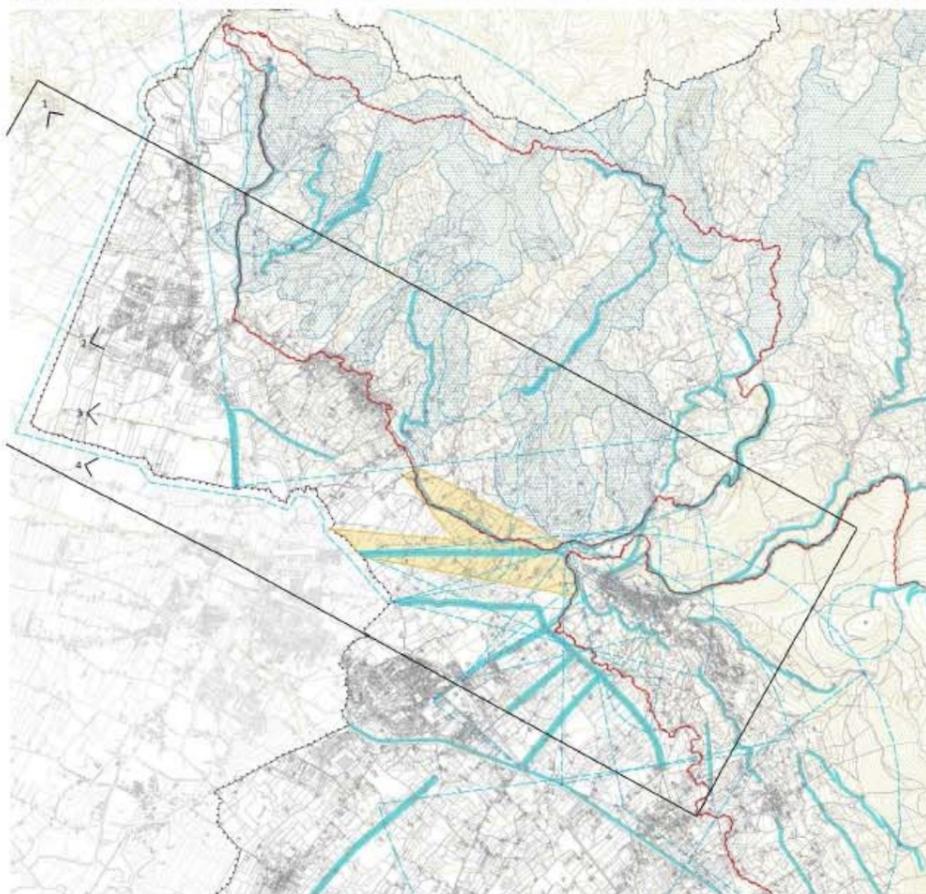
VISUAL INTEGRITY

10

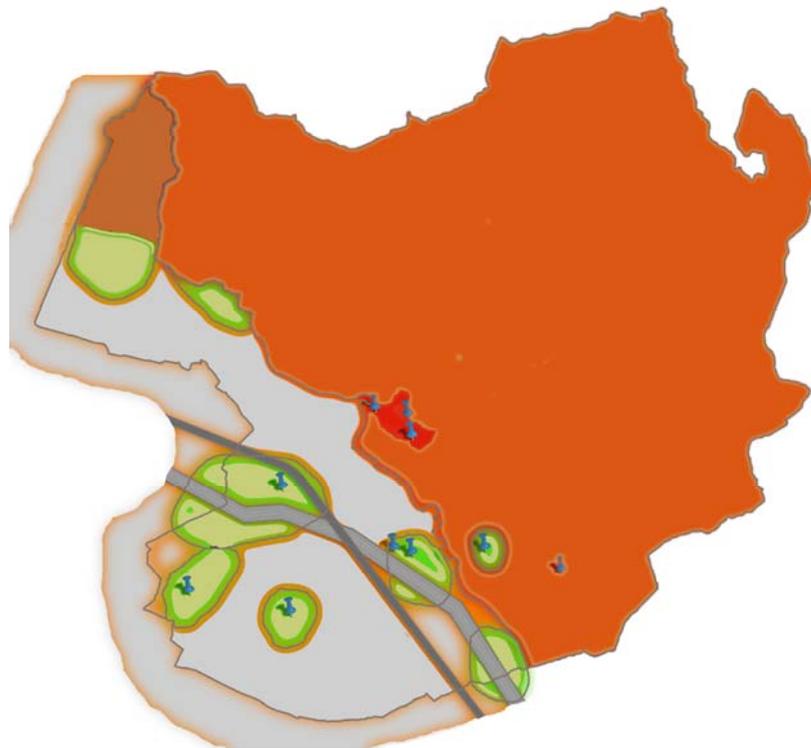


VISUAL INTEGRITY

11



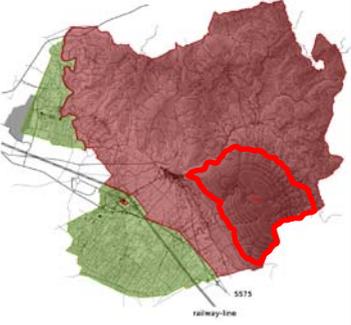
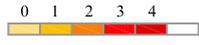
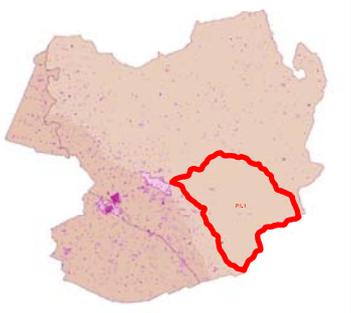
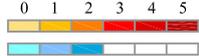
VISUAL INTEGRITY PLAN



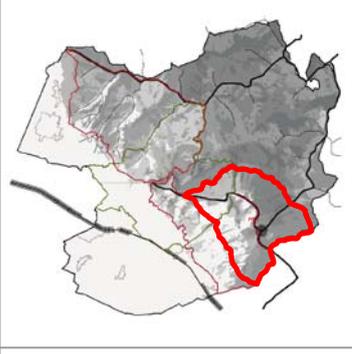
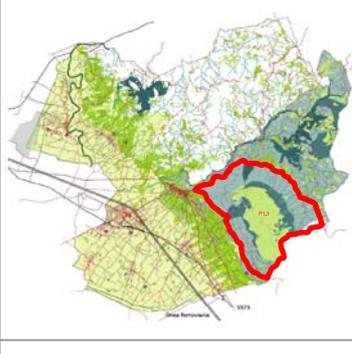
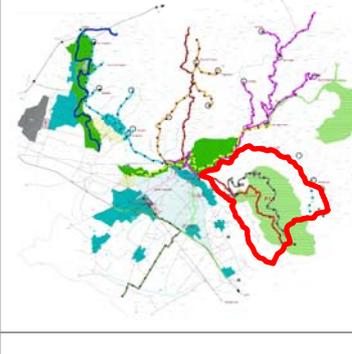
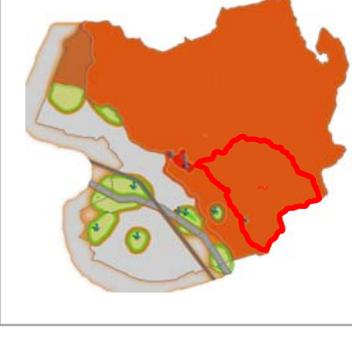
-  intact areas from the point of view of visual integrity
-  partially intact areas from the point of view of visual integrity
-  hamlets, which are already compromised from the point of view of visual integrity
-  Petrignano, which is already compromised from the point of view of visual integrity. From here, Assisi is no longer visible



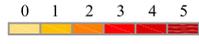
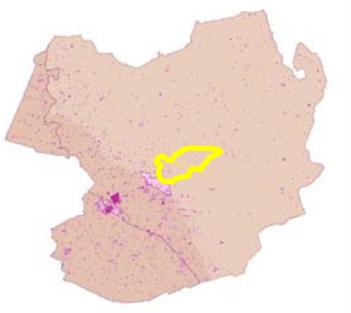
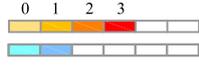
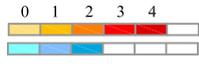
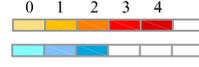
Methodological approach to the conservation of HUL: the case of Assisi
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA P1.1	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P1.1 is included in the "Core zone" of the UNESCO site.</p> <p style="text-align: right;">  </p>
	<p>PROTECTED AREAS</p> <p>The Area P1.1 is included in the following protected areas: 8 - La fruizione del M.Subasio (partly) 9 - M.Subasio's Park (partly)</p> <p>APSp Grandi Panorami (partly)</p> <p>SIC (Sites of community interest): C IT 5210027 (Monte Subasio) partly D IT 5210030 (Fosso dell'Eremo delle Carceri) partly</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <p style="text-align: right;">  </p>
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The Area P1.1 has high identity. The system of buildings is rarefied and it includes small castles. The human presence from the Middle Age is represented both by the Benedictian Abbazey of San Benedetto and the Eremiti system, which are linked with the city.</p> <p>Importance of the resource: high Possibility of change: no change</p> <p style="text-align: right;">  </p>
	<p>LANDSCAPE RESOURCES</p> <p>The Area P1.1 has very high geobotanic importance and it is an integral part of the image of the territory.</p> <p>Importance of the resource: very high Possibility of change: negligible change</p> <p style="text-align: right;">  </p>
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The Area P1.1 includes natural and landscape resources of the utmost importance (SIC).</p> <p>Importance of the resource: very high Possibility of change: negligible change</p> <p style="text-align: right;">  </p>

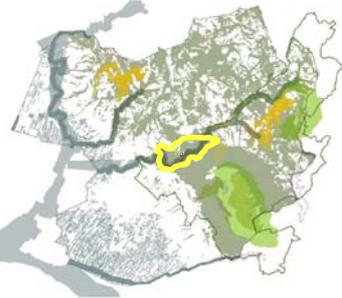
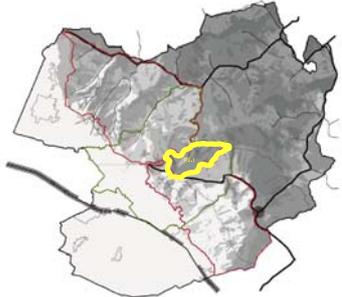
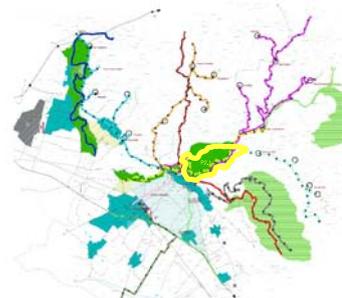
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AREA P1.1	INTENSITY OF THE RESOURCES																												
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P1.1 includes the main ecological connections of the territory.</p> <p>Importance of the resource: very high Possibility of change: minor change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #ffff00;"></td><td style="width: 10px; height: 10px; background-color: #ffcc00;"></td><td style="width: 10px; height: 10px; background-color: #ff9900;"></td><td style="width: 10px; height: 10px; background-color: #ff6600;"></td><td style="width: 10px; height: 10px; background-color: #ff3300;"></td><td style="width: 10px; height: 10px; background-color: #ff0000;"></td><td style="width: 10px; height: 10px; background-color: #cc0000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">5</td><td style="text-align: center;">5</td></tr> </table> </div> <div> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #00ffff;"></td><td style="width: 10px; height: 10px; background-color: #00ccff;"></td><td style="width: 10px; height: 10px; background-color: #0099ff;"></td><td style="width: 10px; height: 10px; background-color: #0066ff;"></td><td style="width: 10px; height: 10px; background-color: #0033ff;"></td><td style="width: 10px; height: 10px; background-color: #0000ff;"></td><td style="width: 10px; height: 10px; background-color: #000000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">5</td><td style="text-align: center;">5</td></tr> </table> </div> </div>								0	1	2	3	4	5	5								0	1	2	3	4	5	5
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	<p>SYMBOLICAL RESOURCES</p> <p>Mount Subasio represents the main image of the territory of Assisi, the first territorial point of reference, which is visible from the main road system.</p> <p>Importance of the resource: high Possibility of change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #ffff00;"></td><td style="width: 10px; height: 10px; background-color: #ffcc00;"></td><td style="width: 10px; height: 10px; background-color: #ff9900;"></td><td style="width: 10px; height: 10px; background-color: #ff6600;"></td><td style="width: 10px; height: 10px; background-color: #ff3300;"></td><td style="width: 10px; height: 10px; background-color: #ff0000;"></td><td style="width: 10px; height: 10px; background-color: #cc0000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td></tr> </table> </div> <div> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #00ffff;"></td><td style="width: 10px; height: 10px; background-color: #00ccff;"></td><td style="width: 10px; height: 10px; background-color: #0099ff;"></td><td style="width: 10px; height: 10px; background-color: #0066ff;"></td><td style="width: 10px; height: 10px; background-color: #0033ff;"></td><td style="width: 10px; height: 10px; background-color: #0000ff;"></td><td style="width: 10px; height: 10px; background-color: #000000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td></tr> </table> </div> </div>								0	1	2	3	4	4	4								0	1	2	3	4	4	4
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	<p>SOCIO-ECONOMIC RESOURCES</p> <p>Both forest areas and pasture land, highly important for the economic production, are to be found.</p> <p>Importance of the resource: high Possibility of change: no change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #ffff00;"></td><td style="width: 10px; height: 10px; background-color: #ffcc00;"></td><td style="width: 10px; height: 10px; background-color: #ff9900;"></td><td style="width: 10px; height: 10px; background-color: #ff6600;"></td><td style="width: 10px; height: 10px; background-color: #ff3300;"></td><td style="width: 10px; height: 10px; background-color: #ff0000;"></td><td style="width: 10px; height: 10px; background-color: #cc0000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td></tr> </table> </div> <div> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #00ffff;"></td><td style="width: 10px; height: 10px; background-color: #00ccff;"></td><td style="width: 10px; height: 10px; background-color: #0099ff;"></td><td style="width: 10px; height: 10px; background-color: #0066ff;"></td><td style="width: 10px; height: 10px; background-color: #0033ff;"></td><td style="width: 10px; height: 10px; background-color: #0000ff;"></td><td style="width: 10px; height: 10px; background-color: #000000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td></tr> </table> </div> </div>								0	1	2	3	4	4	4								0	1	2	3	4	4	4
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0	1	2	3	4	4	4																							
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>paths leading to the Franciscan places - including the <i>Eremo delle Carceri</i> and the forest of St. Francis - can be detected.</p> <p>Importance of the resource: high Possibility of change: moderate change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #ffff00;"></td><td style="width: 10px; height: 10px; background-color: #ffcc00;"></td><td style="width: 10px; height: 10px; background-color: #ff9900;"></td><td style="width: 10px; height: 10px; background-color: #ff6600;"></td><td style="width: 10px; height: 10px; background-color: #ff3300;"></td><td style="width: 10px; height: 10px; background-color: #ff0000;"></td><td style="width: 10px; height: 10px; background-color: #cc0000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td></tr> </table> </div> <div> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #00ffff;"></td><td style="width: 10px; height: 10px; background-color: #00ccff;"></td><td style="width: 10px; height: 10px; background-color: #0099ff;"></td><td style="width: 10px; height: 10px; background-color: #0066ff;"></td><td style="width: 10px; height: 10px; background-color: #0033ff;"></td><td style="width: 10px; height: 10px; background-color: #0000ff;"></td><td style="width: 10px; height: 10px; background-color: #000000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td><td style="text-align: center;">4</td></tr> </table> </div> </div>								0	1	2	3	4	4	4								0	1	2	3	4	4	4
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	<p>VISUAL INTEGRITY</p> <p>The Area P1.1 is intact from the visual point of view.</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #ffff00;"></td><td style="width: 10px; height: 10px; background-color: #ffcc00;"></td><td style="width: 10px; height: 10px; background-color: #ff9900;"></td><td style="width: 10px; height: 10px; background-color: #ff6600;"></td><td style="width: 10px; height: 10px; background-color: #ff3300;"></td><td style="width: 10px; height: 10px; background-color: #ff0000;"></td><td style="width: 10px; height: 10px; background-color: #cc0000;"></td></tr> <tr><td style="text-align: center;">0</td><td style="text-align: center;">1</td><td style="text-align: center;">2</td><td style="text-align: center;">3</td><td style="text-align: center;">4</td><td style="text-align: center;">5</td><td style="text-align: center;">5</td></tr> </table> </div> </div>								0	1	2	3	4	5	5														
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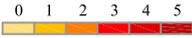
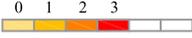
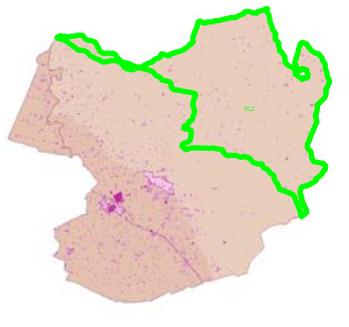
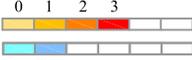
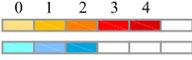
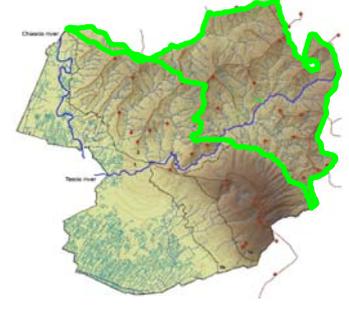
Methodological approach to the conservation of HUL: the case of Assisi
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AREA P2.1	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P2.1 is included in the "Core zone" of the UNESCO site.</p> <p style="text-align: right;">  </p>
	<p>PROTECTED AREAS</p> <p>The Area P2.1 is included in the following protected areas:</p> <p>7 - La valle dei Mulini - la porta del parco del Subasio (entirely) 9 - M.Subasio's Park (partly)</p> <p>APSp Grandi Panorami (entirely)</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <p style="text-align: right;">  </p>
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The Area P2.1 has high identity. The system of buildings is rarefied and it includes small castles, towers, mills and artifacts related to water service.</p> <p>Importance of the resource: medium Possibility for change: no change</p> <p style="text-align: right;">  </p>
	<p>LANDSCAPE RESOURCES</p> <p>The Area P2.1 has high geobotanic importance and it is an integral part of the image of the territory.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">  </p>
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The Area P2.1 includes highly important natural and landscape resources</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">  </p>

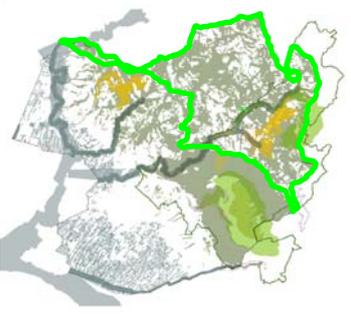
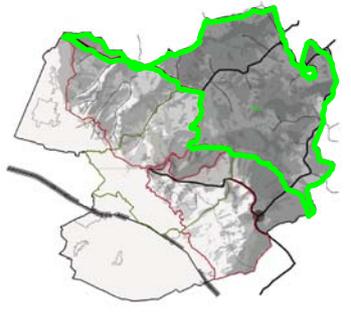
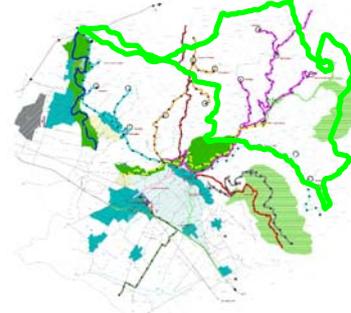
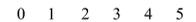
Methodological approach to the conservation of HUL: the case of Assisi
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA P2.1	INTENSITY OF THE RESOURCES																								
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P2.1 includes the main ecological connections of the territory.</p> <p>Importance of the resource: very high Possibility for change: minor change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #fff9c4;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #fff176;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ffeb3b;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff9800;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff5722;"></td><td>4</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #d32f2f;"></td><td>5</td></tr> </table> </div> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #e0f7fa;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #b2dfdb;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #81c784;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #4db6ac;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #26a69a;"></td><td>4</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #009688;"></td><td>5</td></tr> </table> </div> </div>		0		1		2		3		4		5		0		1		2		3		4		5
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	<p>SYMBOLICAL RESOURCES</p> <p>This Area represents the hidden image of Assisi and it carries a great sense of local identity</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #fff9c4;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #fff176;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ffeb3b;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff9800;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff5722;"></td><td>4</td></tr> </table> </div> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #e0f7fa;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #b2dfdb;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #81c784;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #4db6ac;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #26a69a;"></td><td>4</td></tr> </table> </div> </div>		0		1		2		3		4		0		1		2		3		4				
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	<p>SOCIO-ECONOMIC RESOURCES</p> <p>the area is mainly used for arable land and olive groves</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #fff9c4;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #fff176;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ffeb3b;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff9800;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff5722;"></td><td>4</td></tr> </table> </div> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #e0f7fa;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #b2dfdb;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #81c784;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #4db6ac;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #26a69a;"></td><td>4</td></tr> </table> </div> </div>		0		1		2		3		4		0		1		2		3		4				
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	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>the area is mainly linked to production and rural tourism net(farm holidays)</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #fff9c4;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #fff176;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ffeb3b;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff9800;"></td><td>3</td></tr> </table> </div> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #e0f7fa;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #b2dfdb;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #81c784;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #4db6ac;"></td><td>3</td></tr> </table> </div> </div>		0		1		2		3		0		1		2		3								
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	<p>VISUAL INTEGRITY</p> <p>The P2.1 Area is intact from the visual point of view.</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <table style="border-collapse: collapse;"> <tr><td style="width: 10px; height: 10px; background-color: #fff9c4;"></td><td>0</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #fff176;"></td><td>1</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ffeb3b;"></td><td>2</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff9800;"></td><td>3</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #ff5722;"></td><td>4</td></tr> <tr><td style="width: 10px; height: 10px; background-color: #d32f2f;"></td><td>5</td></tr> </table> </div> </div>		0		1		2		3		4		5												
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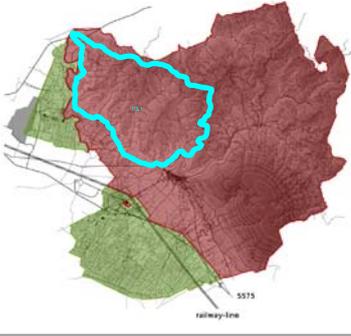
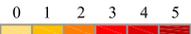
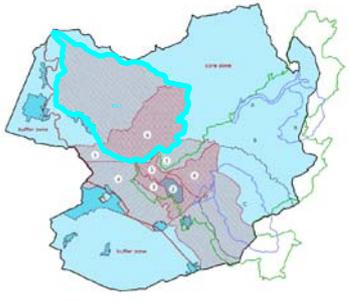
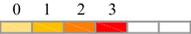
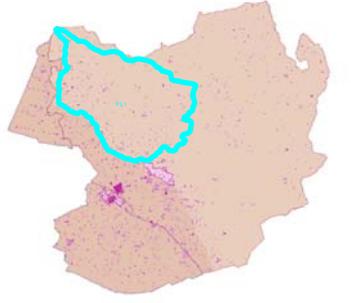
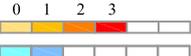
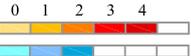
Methodological approach to the conservation of HUL: the case of Assisi
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA P2.2	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P2.2 is included in the "Core zone" of the UNESCO site.</p> <div style="text-align: right;">  </div>
	<p>PROTECTED AREAS</p> <p>The Area P2.2 is included in the following protected areas:</p> <p>9 - M.Subasio's Park (partly)</p> <p>SIC (Sites of Community interest): A IT 5210022 (Fiume Tescio) entirely B IT 5210023 (Colli Selvalonga-Casale il Monte) partly</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <div style="text-align: right;">  </div>
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The Area P2.2 has high identity. The system of buildings is rarefied and it includes small castles (Armenzano, Notiano, Petraia).</p> <p>Importance of the resource: medium Possibility for change: no change</p> <div style="text-align: right;">  </div>
	<p>LANDSCAPE RESOURCES</p> <p>The Area P2.2 has high geobotanic value and it is an integral part of the image of the territory.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="text-align: right;">  </div>
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The Area P2.2 includes highly important natural and landscape resources (SIC).</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> <div style="text-align: right;">  </div>

Methodological approach to the conservation of HUL: the case of Assisi
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AREA P2.2	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P2.2 includes the main ecological connections of the territory.</p> <p>Importance of the resource: very high Possibility for change: minor change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4 5</p>  </div> <div> <p>0 1 2 3 4 5</p>  </div> </div>
	<p>SYMBOLICAL RESOURCES</p> <p>This Area represents the hidden image of Assisi and it carries a great sense of local identity</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>SOCIO-ECONOMIC RESOURCES</p> <p>Forest areas, pasture and arable land, highly important for the economic production, are to be found.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>The main infrastructure network is represented by the route to Gubbio</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>VISUAL INTEGRITY</p> <p>The Area P2.2 is intact from the visual point of view.</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div> <p>0 1 2 3 4 5</p>  </div> </div>

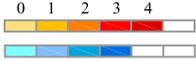
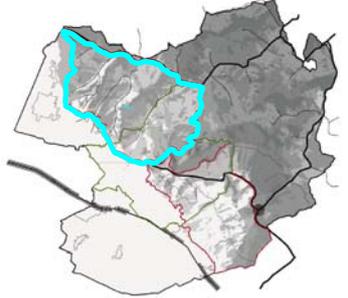
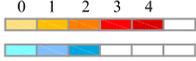
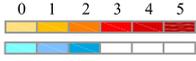
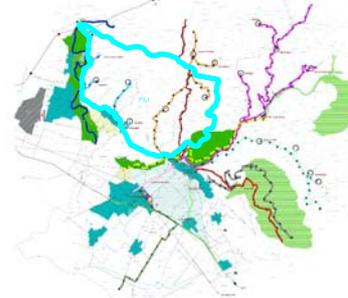
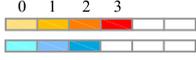
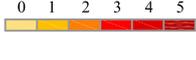
Methodological approach to the conservation of HUL: the case of Assisi
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AREA P3.1	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P3.1 is included in the "Core zone" of the UNESCO site.</p> <div style="text-align: right;">  </div>
	<p>PROTECTED AREAS</p> <p>The Area P3.1 is included in the following protected areas:</p> <p>6 La porta pedemontana del colle di san Fortunato (partly) APSp Grandi Panorami (entirely)</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <div style="text-align: right;">  </div>
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The system of buildings is rarefied and it includes small medieval castles which are important from the historical and cultural point of view (S.Gregorio, Rocca S.Angelo, Sterpeto, Mora, Beviglie, Tordibetto).</p> <p>Importance of the resource: medium Possibility for change: no change</p> <div style="text-align: right;">  </div>
	<p>LANDSCAPE RESOURCES</p> <p>The Area P3.1 has high geobotanic importance and it is an integral part of the image of the territory.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="text-align: right;">  </div>
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The Area P3.1 includes important natural and landscape resources which are linked to the Chiascio river.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="text-align: right;">  </div>

Methodological approach to the conservation of HUL: the case of Assisi

Division of the territory into macro-areas.

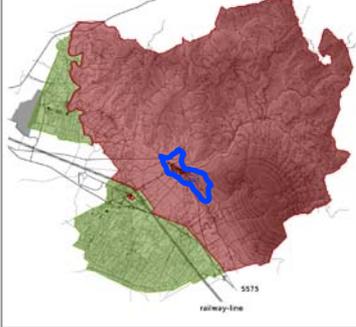
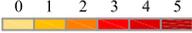
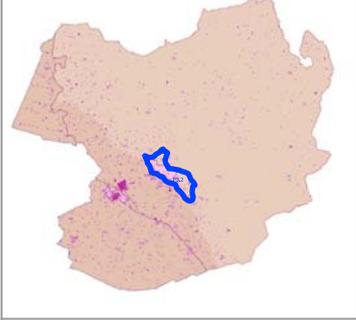
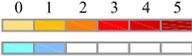
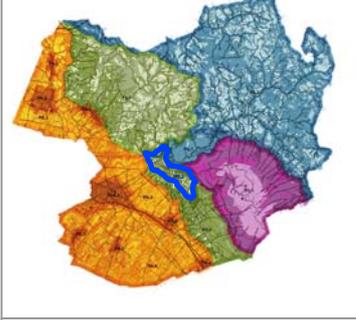
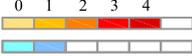
Definition of the intensity and possibility of change of resources.

AREA P3.1	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P3.1 includes both the main and the secondary ecological connections of the territory.</p> <p>Importance of the resource: high Possibility for change: minor change</p> 
	<p>SYMBOLICAL RESOURCES</p> <p>This Area represents the hidden image of Assisi and it carries a great sense of local identity</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>SOCIO-ECONOMIC RESOURCES</p> <p>The Area is important for the economic production of the DOC wine and olive groves</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> 
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>the area is mainly linked to production and rural tourism net (farm holidays)</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area P3.1 is intact from the visual point of view.</p> 

Methodological approach to the conservation of HUL: the case of Assisi

Division of the territory into macro-areas.

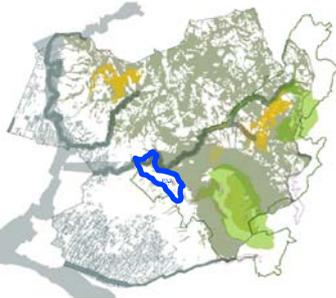
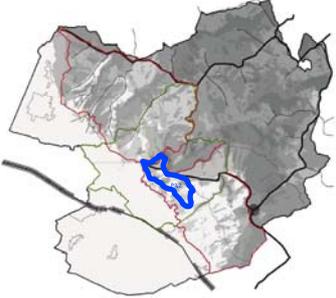
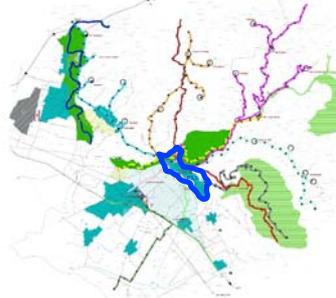
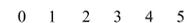
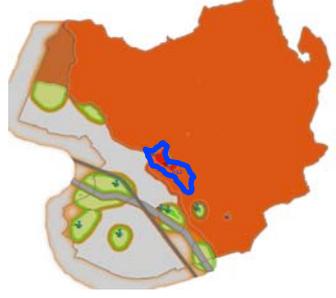
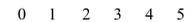
Definition of the intensity and possibility of change of resources.

AREA P3.2	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P3.2 is included in the "Core zone" of the UNESCO site.</p> 
	<p>PROTECTED AREAS</p> <p>The Area P3.2 is included in the following protected areas:</p> <p>1-2 Il parco delle mura e del margine moderno (entirely)</p> <p>9 - M.Subasio's Park (entirely)</p> <p>APSp Grandi Panorami (entirely)</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> 
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The Area P3.2 has very high identity. It includes buildings and churches which have an exceptional importance from the architectural, historical and symbolical point of view (St.Francis, S.Chiera, Rocca Maggiore etc.).</p> <p>Importance of the resource: very high</p> <p>Possibility for change: no change</p> 
	<p>LANDSCAPE RESOURCES</p> <p>The settlement system of the walled city maintains its original scenographic terraced structure and it is of the utmost importance from a landscape point of view</p> <p>Importance of the resource: very high</p> <p>Possibility for change: no change</p> 
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The Area P3.2 includes highly important landscape resources.</p> <p>Importance of the resource: high</p> <p>Possibility for change: no change</p> 

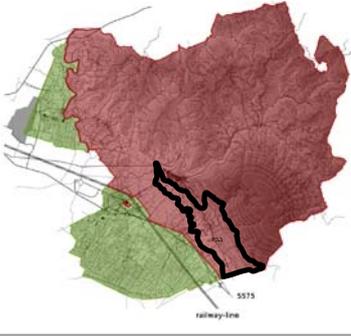
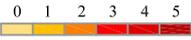
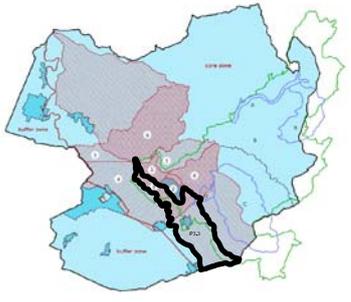
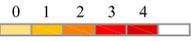
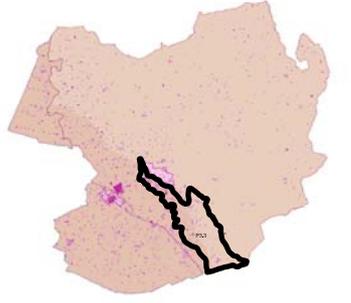
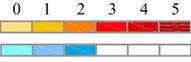
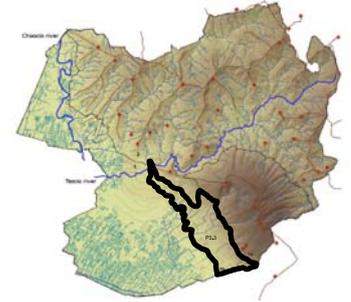
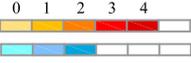
Methodological approach to the conservation of HUL: the case of Assisi

Division of the territory into macro-areas.

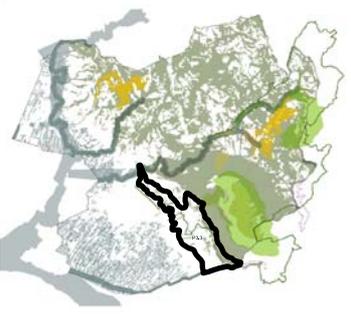
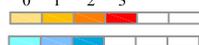
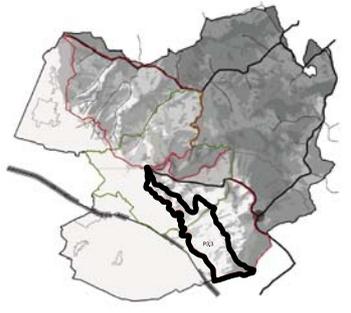
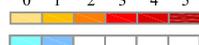
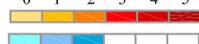
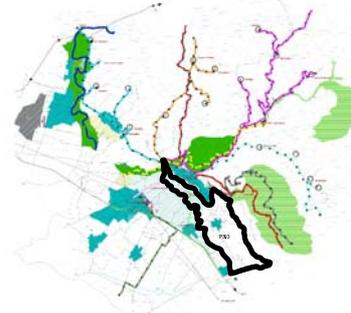
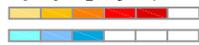
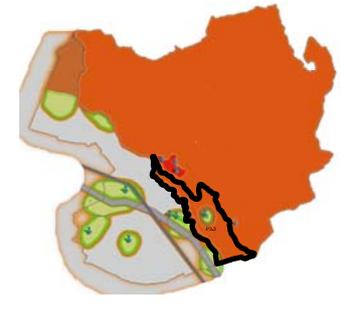
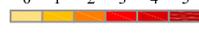
Definition of the intensity and possibility of change of resources.

AREA P3.2	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P3.2 includes the secondary ecological connections of the territory.</p> <p>Importance of the resource: medium Possibility for change: no change</p> <p>0 1 2 3  </p>
	<p>SYMBOLICAL RESOURCES</p> <p>The settlement system of the walled city, founded on a great Hellenic sanctuary, maintains its original terraced scenographic structure on which two outstanding elements rise: S.Francis Basilica and S.Chiera one, which are symbolically two of the major pilgrimage destinations in the world.</p> <p>Importance of the resource: very high Possibility for change: no change</p> <p>0 1 2 3 4 5  </p>
	<p>SOCIO - ECONOMIC RESOURCES</p> <p>The touristic resource is the most important one for Assisi and Umbrian Region</p> <p>Importance of the resource: very high Possibility for change: no change</p> <p>0 1 2 3 4 5  </p>
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>S.Francis and S.Chiera Basilicas, together with Franciscan places, represent world-famous pilgrimage and tourism destinations</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> <p>0 1 2 3 4 5  </p>
	<p>VISUAL INTEGRITY</p> <p>The Area P3.2 is intact from the visual point of view.</p> <p>0 1 2 3 4 5 </p>

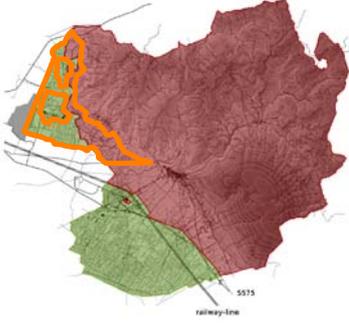
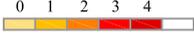
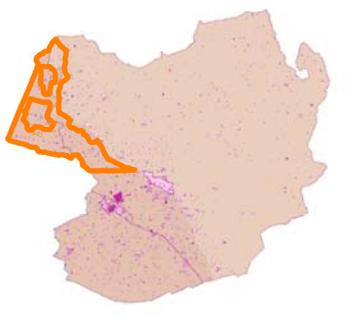
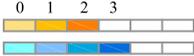
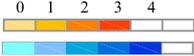
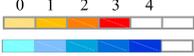
Methodological approach to the conservation of HUL: the case of Assisi
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA P3.3	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P3.3 is included in the "Core zone" of the UNESCO site.</p> <div style="text-align: right;">  </div>
	<p>PROTECTED AREAS</p> <p>The Area P3.3 is included in the following protected areas:</p> <p>3 - La ricomposizione paesaggistica degli uliveti (partly) 9 - M.Subasio's Park (partly)</p> <p>APSp Grandi Panorami (entirely)</p> <p>SIC (Sites of Community interest): D IT 5210030 (Fosso dell'Eremo delle Carceri) partly</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <div style="text-align: right;">  </div>
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The settlement system reminds of Roman structures, witnessed by numerous ruins of places of worship, burial and civil buildings (villas, tanks, springs).</p> <p>Importance of the resource: high Possibility for change: no change</p> <div style="text-align: right;">  </div>
	<p>LANDSCAPE RESOURCES</p> <p>The settlement system of the city outside the walls maintains its original terraced scenographic structure and it is of the utmost importance from a landscape point of view.</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> <div style="text-align: right;">  </div>
	<p>PHYSICAL NATURAL RESOURCES</p> <p>This area is affected by river processes. Its western side is marked by three main ditches (Fosso delle Carceri, Roseto and Renaro), characterizing the narrow valleys with V-profiles</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="text-align: right;">  </div>

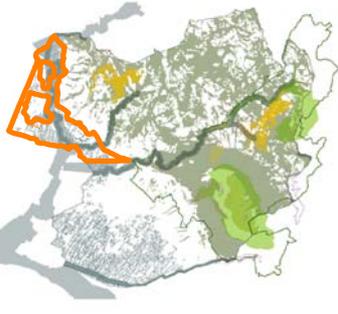
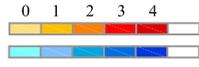
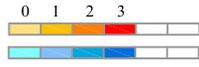
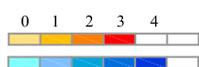
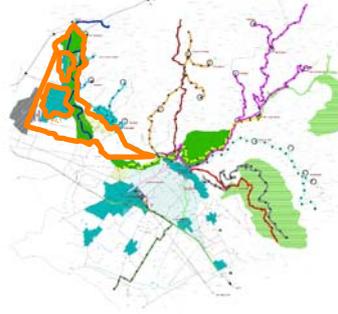
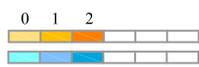
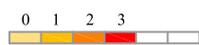
Methodological approach to the conservation of HUL: the case of Assisi
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AREA P3.3	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P3.3 includes the secondary ecological connections of the territory.</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3</p>  </div> <div> <p>0 1 2 3 4 5</p>  </div> </div>
	<p>SYMBOLICAL RESOURCES</p> <p>the settlement system of the city outside the walls maintains its original scenographic structure with a view on the Basilicas and on the main places of worship linked to the Franciscan movement</p> <p>Importance of the resource: very high Possibility for change: no change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4 5</p>  </div> <div> <p>0 1 2 3 4 5</p>  </div> </div>
	<p>SOCIO-ECONOMIC RESOURCES</p> <p>The well-established use of the land is characterized by the presence of the olive, growing on terraces.</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4 5</p>  </div> <div> <p>0 1 2 3 4 5</p>  </div> </div>
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>The infrastructure net is historically represented by a set of exit paths coming out of the city gates southbound towards the valley and eastbound towards Spello, and they represent the most important gateways to the city</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4 5</p>  </div> </div>
	<p>VISUAL INTEGRITY</p> <p>The Area P3.3 is intact from the visual point of view.</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div> <p>0 1 2 3 4 5</p>  </div> </div>

Methodological approach to the conservation of HUL: the case of Assisi
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AREA P4.1	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P4.1 is included partly in the "Core zone" of the UNESCO site and partly in the buffer zone.</p> 
	<p>PROTECTED AREAS</p> <p>The Area P4.1 is included in the following protected areas:</p> <p>5 - Il parco agricolo centrale (partly)</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> 
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The Area P4.1 includes some manor houses</p> <p>Importance of the resource: low Possibility for change: minor change</p> 
	<p>LANDSCAPE RESOURCES</p> <p>This landscape is deeply characterized by the presence of water courses, and it has no special landscape emergencies</p> <p>Importance of the resource: medium Possibility for change: moderate change</p> 
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The landscape is deeply characterized by the presence of water courses (Chiascio River and its tributaries).</p> <p>Importance of the resource: medium Possibility for change: moderate change</p> 

Methodological approach to the conservation of HUL: the case of Assisi
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AREA P4.1	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P4.1 includes both the main and the secondary ecological connections of the territory.</p> <p>Importance of the resource: high Possibility for change: moderate change</p> 
	<p>SYMBOLICAL RESOURCES</p> <p>The area is characterized by the presence of special visual cones towards the city of Assisi. North-east of the area it doesn't present any special symbolical resources since it is seriously compromised by the widespread building development.</p> <p>Importance of the resource: medium Possibility for change: minor change</p> 
	<p>SOCIO-ECONOMIC RESOURCES</p> <p>The resources of the area are linked to the use of the land as simple sowing land, with no special fine cultivations, and to the industrial activity of Petrignano and palazzo, which plays an important role in the economy of Assisi</p> <p>Importance of the resource: medium Possibility for change: moderate change</p> 
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>the zone is predominantly linked to the production (Petrignano)</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>the area towards Petrignano and palazzo is seriously damaged from the visual point of view. in its low part, towards Assisi, the area discloses visual integral sights</p> 

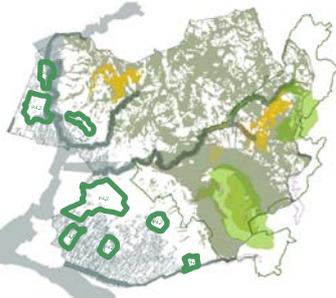
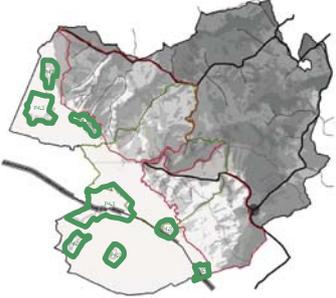
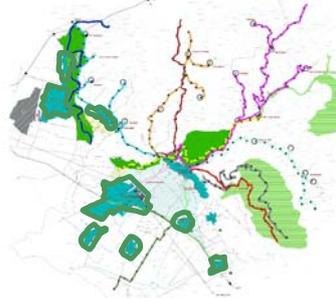
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AREA P4.2	INTENSITY OF THE RESOURCES																																								
	<p>WORLD HERITAGE LIST</p> <p>The Area P4.2 includes the main hamlets of Assisi. Torchiagina, Petrignano, Tordandrea, Castelnuovo are included in the buffer zone. Capodacqua, Rivotorto, S.Maria degli Angeli are included (partly) in the "Core zone" of the UNESCO site and partly in the buffer zone. Palazzo is included entirely in the "Core zone" of the UNESCO site</p> <table style="width: 100%;"> <tr> <td>Torchiagina, Petrignano, Tordandrea, Castelnuovo</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> <tr> <td>Capodacqua, Rivotorto, S.Maria degli Angeli</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> <tr> <td>Palazzo</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> </table>	Torchiagina, Petrignano, Tordandrea, Castelnuovo	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>	0	1	2	3	4	5							Capodacqua, Rivotorto, S.Maria degli Angeli	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td></tr> </table>	0	1	2	3	4						Palazzo	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>	0	1	2	3	4	5						
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	<p>PROTECTED AREAS</p> <p>The P4.2 Areas are included in the following protected area:</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <p style="text-align: right;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: black;"></td></tr> </table> </p>	0	1																																						
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	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>The original and limited settlement system (tower, castle, sanctuary), has undergone numerous modifications throughout time</p> <table style="width: 100%;"> <tr> <td>Importance of the resource:</td> <td style="text-align: center;">medium</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> <tr> <td>Possibility for change:</td> <td style="text-align: center;">major change</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td style="background-color: cyan;"></td><td style="background-color: blue;"></td><td style="background-color: darkblue;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> </table>	Importance of the resource:	medium	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>	0	1	2	3	4	5							Possibility for change:	major change	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td style="background-color: cyan;"></td><td style="background-color: blue;"></td><td style="background-color: darkblue;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>																						
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	<p>LANDSCAPE RESOURCES</p> <p>The plain landscape(Petrignano, S.M.degli Angeli, Rivotorto, Palazzo, Capodacqua, Torchiagina) represents a set of separate unities showing a speed - up development trend in the latest years , which has often considerably modified the original traits of the landscape.</p> <table style="width: 100%;"> <tr> <td>Importance of the resource:</td> <td style="text-align: center;">low</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> <tr> <td>Possibility for change:</td> <td style="text-align: center;">major change</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td style="background-color: cyan;"></td><td style="background-color: blue;"></td><td style="background-color: darkblue;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> </table>	Importance of the resource:	low	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>	0	1	2	3	4	5							Possibility for change:	major change	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td style="background-color: cyan;"></td><td style="background-color: blue;"></td><td style="background-color: darkblue;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>																						
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	<p>PHYSICAL NATURAL RESOURCES</p> <p>Important natural resources linked to the presence of the chiascio and the Tescio are to be found. They have undergone considerable modifications as a consequence of the widespread urbanization.</p> <table style="width: 100%;"> <tr> <td>Importance of the resource:</td> <td style="text-align: center;">medium</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> <tr> <td>Possibility for change:</td> <td style="text-align: center;">moderate change</td> <td style="text-align: center;"> <table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td style="background-color: cyan;"></td><td style="background-color: blue;"></td><td style="background-color: darkblue;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table> </td> </tr> </table>	Importance of the resource:	medium	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td>0</td><td>1</td><td>2</td><td>3</td><td>4</td><td>5</td></tr> <tr><td style="background-color: yellow;"></td><td style="background-color: orange;"></td><td style="background-color: red;"></td><td style="background-color: darkred;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>	0	1	2	3	4	5							Possibility for change:	moderate change	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr><td style="background-color: cyan;"></td><td style="background-color: blue;"></td><td style="background-color: darkblue;"></td><td style="background-color: black;"></td><td style="background-color: black;"></td></tr> </table>																						
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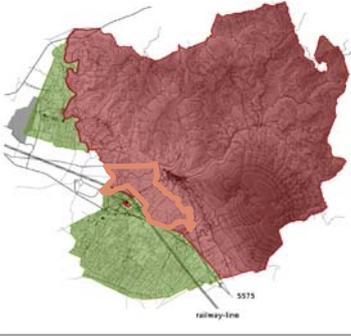
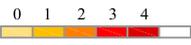
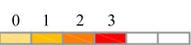
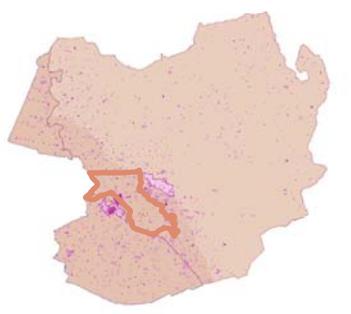
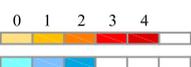
Methodological approach to the conservation of HUL: the case of Assisi

Division of the territory into macro-areas.

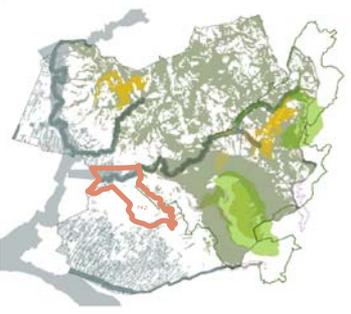
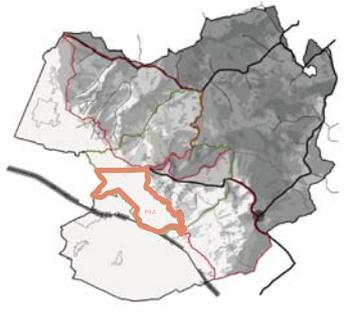
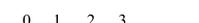
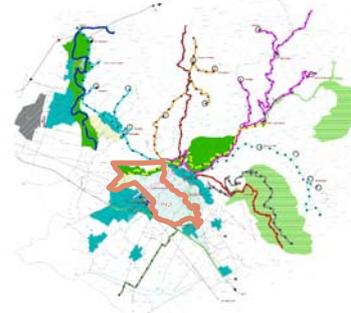
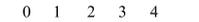
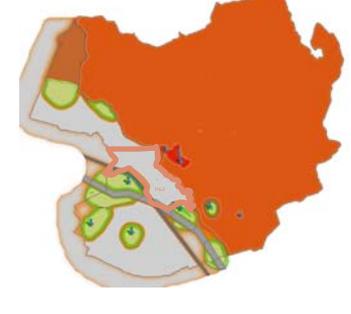
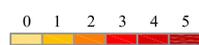
Definition of the intensity and possibility of change of resources.

AREA P4.2	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES These Areas include the main and secondary ecological connections of the territory: Petignano, Palazzo, Torchiagina 0 1 2 3 4</p> <p>These Areas include the secondary ecological connections of the territory: Castelnuovo, Tordandrea 0 1 2</p> <p>These Areas include the minor ecological connections of the territory: S.Maria degli Angeli, Capodacqua, Rivotorto 0 1 2 3 4 5</p> <p>Possibility for change: moderate change [Color scale]</p>
	<p>SYMBOLICAL RESOURCES The settlement system is seriously damaged by the presence of SS75 county road, which represents a barrier between the two sections of the territory it crosses. In crossing the centres of the plain, the road heavily affects their asset and provokes a modification in their shape, turning them from isolated into linear and continuous centres. The same symbolic places (Porziuncola, Rivotorto) are suffocated by the presence of a surrounding irregular/chaotic building.</p> <p>S.Maria degli Angeli, Rivotorto 0 1 2 3 4 Petignano, Palazzo, Torchiagina, Capodacqua, Castelnuovo, Tordandrea 0 1</p> <p>Possibility for change: major change [Color scale]</p>
	<p>SOCIO-ECONOMIC RESOURCES The touristic resource is the most important one for S.Maria degli Angeli. Other hiddens are predominantly linked to the production and rural tourism net(farm holidays)</p> <p>Importance of the resource: medium 0 1 2 3 4 5 Possibility for change: moderate change [Color scale]</p>
	<p>PILGRIMAGE AND TOURISM RESOURCES The touristic resource is the most important one for S.Maria degli Angeli and Rivotorto.</p> <p>S.Maria degli Angeli, Rivotorto 0 1 2 3 4 Petignano, Palazzo, Torchiagina, Tordandrea, Capodacqua, Castelnuovo 0 1 2</p> <p>Possibility for change: negligible change [Color scale]</p>
	<p>VISUAL INTEGRITY Petignano, Palazzo, S. Maria degli Angeli are heavily undermined from the point of view of their visual integrity (while) Castelnuovo, Tordandrea, Rivotorto still retain part of theirs.</p> <p>S.Maria degli Angeli, Petignano, Palazzo, Torchiagina 0 1 Rivotorto, Tordandrea, Capodacqua, Castelnuovo 0 1 2</p>

Methodological approach to the conservation of HUL: the case of Assisi
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA P4.3	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P4.3 is included partly in the "Core zone" of the UNESCO site and partly in the buffer zone.</p> <p style="text-align: right;">  </p>
	<p>PROTECTED AREAS</p> <p>The P4.3 Area is included in the following protected areas:</p> <p>4- Il parco agricolo centrale (entirely)</p> <p>9 - M.Subasio's Park (partly)</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <p style="text-align: right;">  </p>
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>This landscape is one of the most significant of the territory. In fact it includes the area below the walled city, in the past marked by a centurion mail and in the Middle Ages by the widespread outstanding elements of Franciscan heritage.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">  </p>
	<p>LANDSCAPE RESOURCES</p> <p>The landscape is sensibly marked by the main infrastructure network - delimited by the four radial antique lift-system routes between Assisi (from Porta Moiano to Porta S. Pietro) and the basilica of S. Maria degli Angeli- and by the longitudinal path of "Francesca way" linked to the history of the Franciscan movement.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">  </p>
	<p>PHYSICAL NATURAL RESOURCES</p> <p>The Area P4.3 includes natural and landscape resources which have high importance</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">  </p>

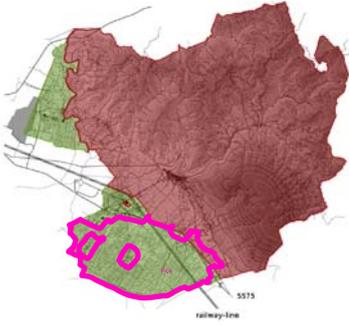
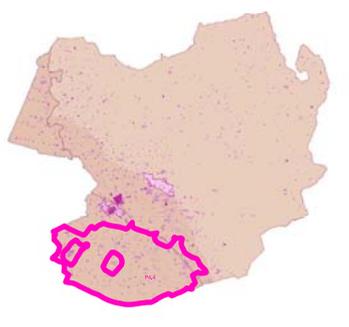
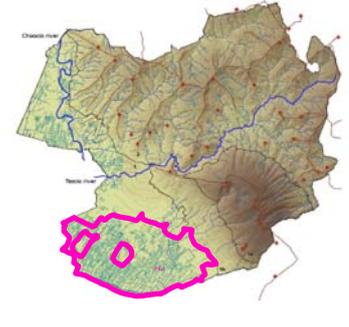
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AREA P4.3	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P4.3 includes the main and the secondary ecological connections of the territory.</p> <p>Importance of the resource: high Possibility for change: moderate change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>SYMBOLICAL RESOURCES</p> <p>This area represents the territory from which we can approach Assisi and catch the symbolic landmarks characterizing its historic, cultural and spiritual identity.</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>SOCIO-ECONOMIC RESOURCES</p> <p>the zone is predominantly linked to the production and rural tourism net (farm holidays)</p> <p>Importance of the resource: medium Possibility for change: moderate change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>There is the presence of the paths leading to the Franciscan places ("strada mattonata" e "percorso verso San Damiano").</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div style="margin-right: 10px;"> <p>0 1 2 3 4</p>  </div> <div> <p>0 1 2 3 4</p>  </div> </div>
	<p>VISUAL INTEGRITY</p> <p>The P4.3 Area is intact from the visual point of view.</p> <div style="display: flex; justify-content: flex-end; align-items: center;"> <div> <p>0 1 2 3 4 5</p>  </div> </div>

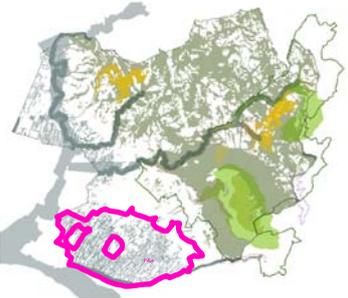
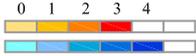
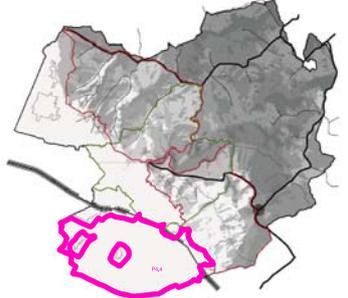
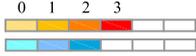
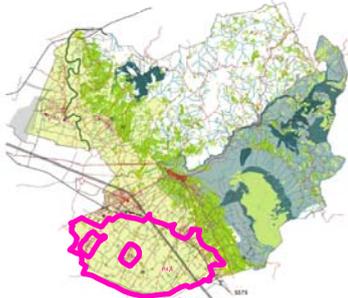
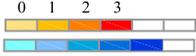
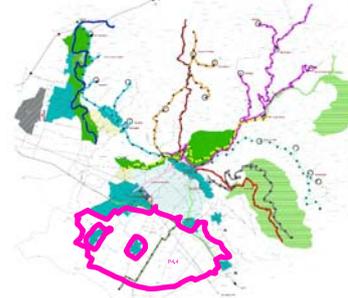
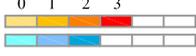
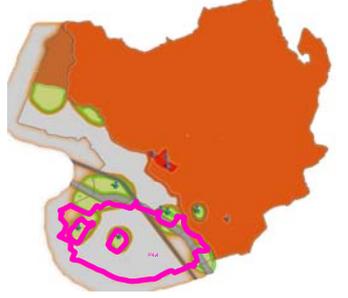
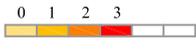
Methodological approach to the conservation of HUL: the case of Assisi

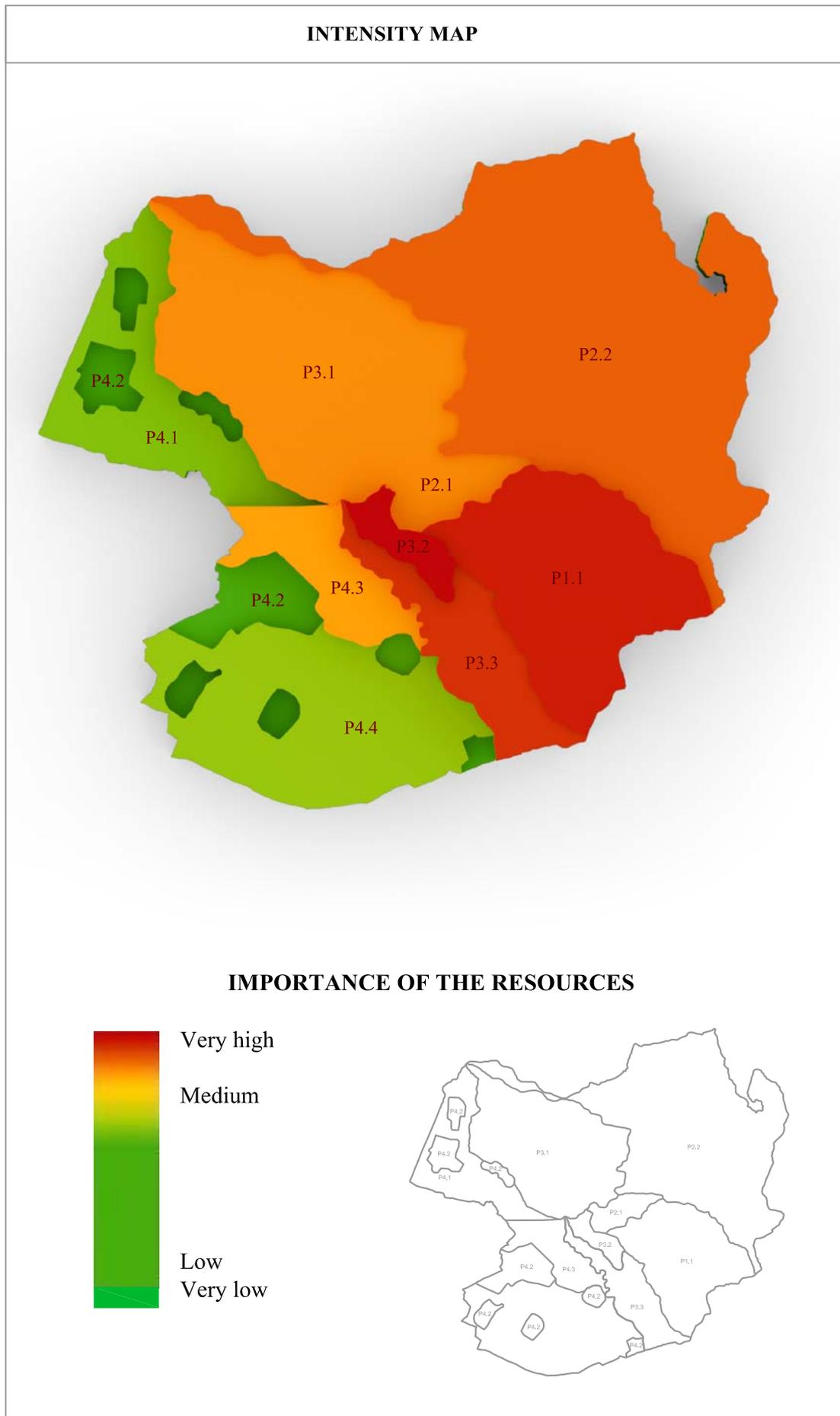
Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

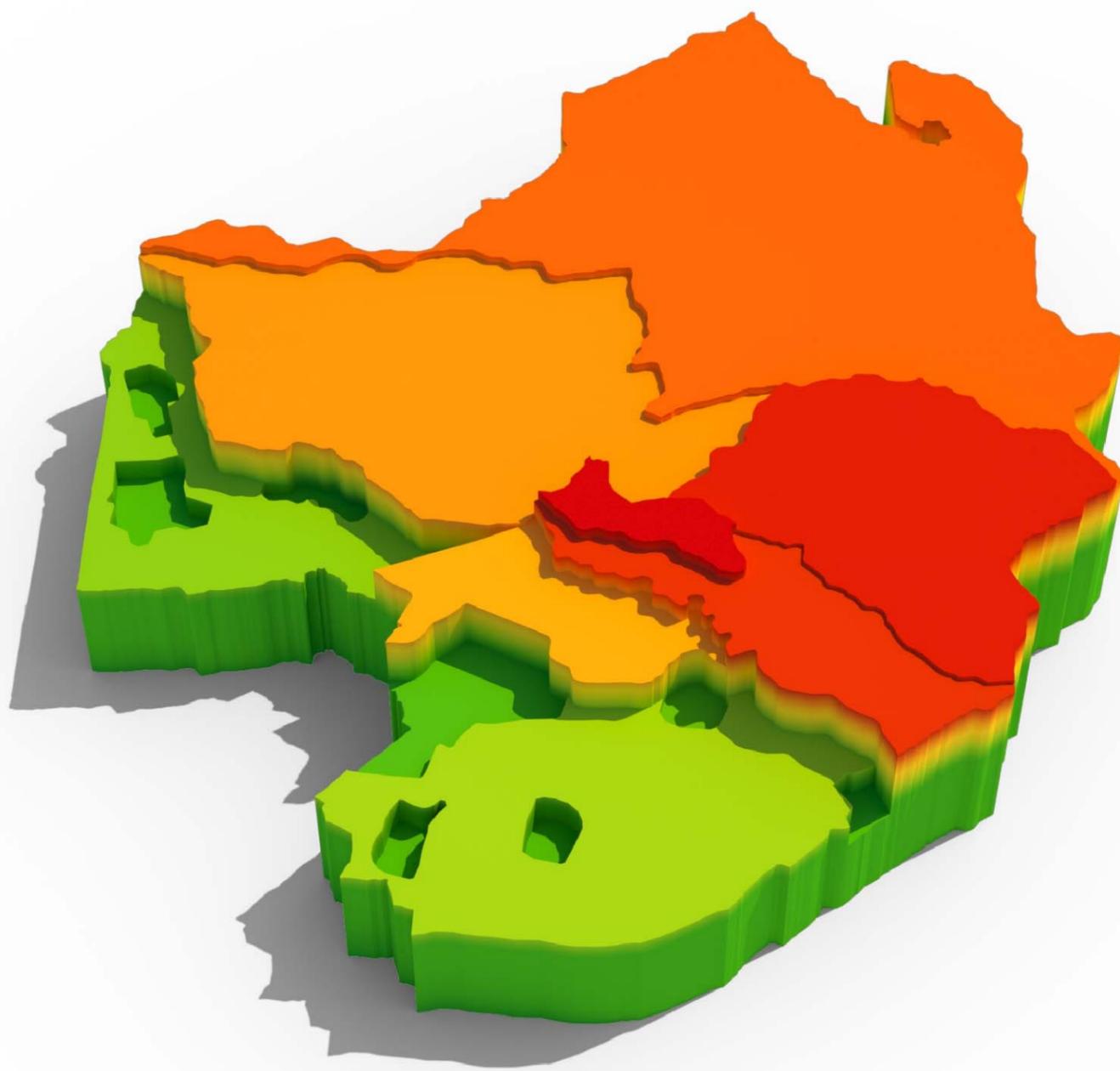
AREA P4.4	INTENSITY OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area P4.4 is included partly in the "Core zone" of the UNESCO site and partly in the buffer zone.</p> <p style="text-align: right;">0 1 2 3 4</p> 
	<p>PROTECTED AREAS</p> <p>The Area P4.4 is included in the following protected areas:</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <p style="text-align: right;">0 1</p> 
	<p>HISTORICAL/CULTURAL RESOURCES</p> <p>This area includes a series of isolated artifacts of no relevant architectural value, which anyway represent the identity of the agricultural territory of Assisi.</p> <p>Importance of the resource: low Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2</p> 
	<p>LANDSCAPE RESOURCES</p> <p>This landscape is typically agricultural, with numerous isolated rural houses and farms and a dense network of drainage canals and ditches with rows of trees reinforcing the banks. The landscape identity of this section of the plain retains its original features almost intact.</p> <p>Importance of the resource: high Possibility for change: moderate change</p> <p style="text-align: right;">0 1 2 3 4</p> 
	<p>PHYSICAL NATURAL RESOURCES</p> <p>This area includes canals and ditches used by agriculture, thus giving shape to a well-established image of the territory.</p> <p>Importance of the resource: high Possibility for change: moderate change</p> <p style="text-align: right;">0 1 2 3 4</p> 

Methodological approach to the conservation of HUL: the case of Assisi
Division of the territory into macro-areas.
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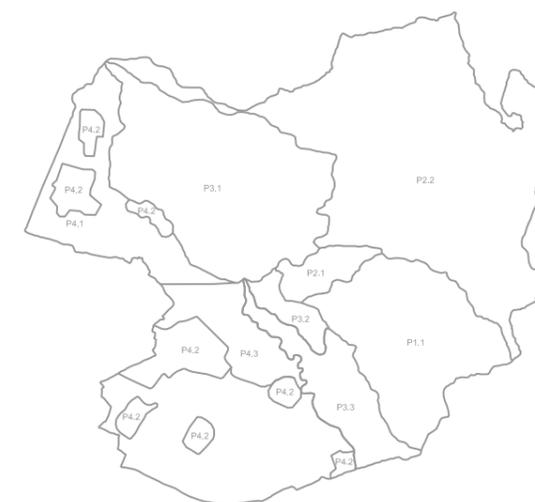
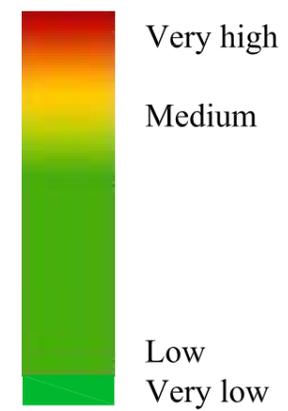
AREA P4.4	INTENSITY OF THE RESOURCES
	<p>ECOLOGICAL RESOURCES</p> <p>The Area P4.3 includes the secondary ecological connections of the territory.</p> <p>Importance of the resource: medium Possibility for change: moderate change</p> 
	<p>SYMBOLICAL RESOURCES</p> <p>This area represents the territory from which we can approach Assisi and see the symbolic landmarks of the city.</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>SOCIO-ECONOMIC RESOURCES</p> <p>The zone is predominantly linked to the production of simple arable</p> <p>Importance of the resource: medium Possibility for change: moderate change</p> 
	<p>PILGRIMAGE AND TOURISM RESOURCES</p> <p>Rural tourism net (farm holidays)</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area P4.4 is partially intact from the visual point of view. The areas along the SS75 are severely compromised from the visual integrity point of view.</p> 



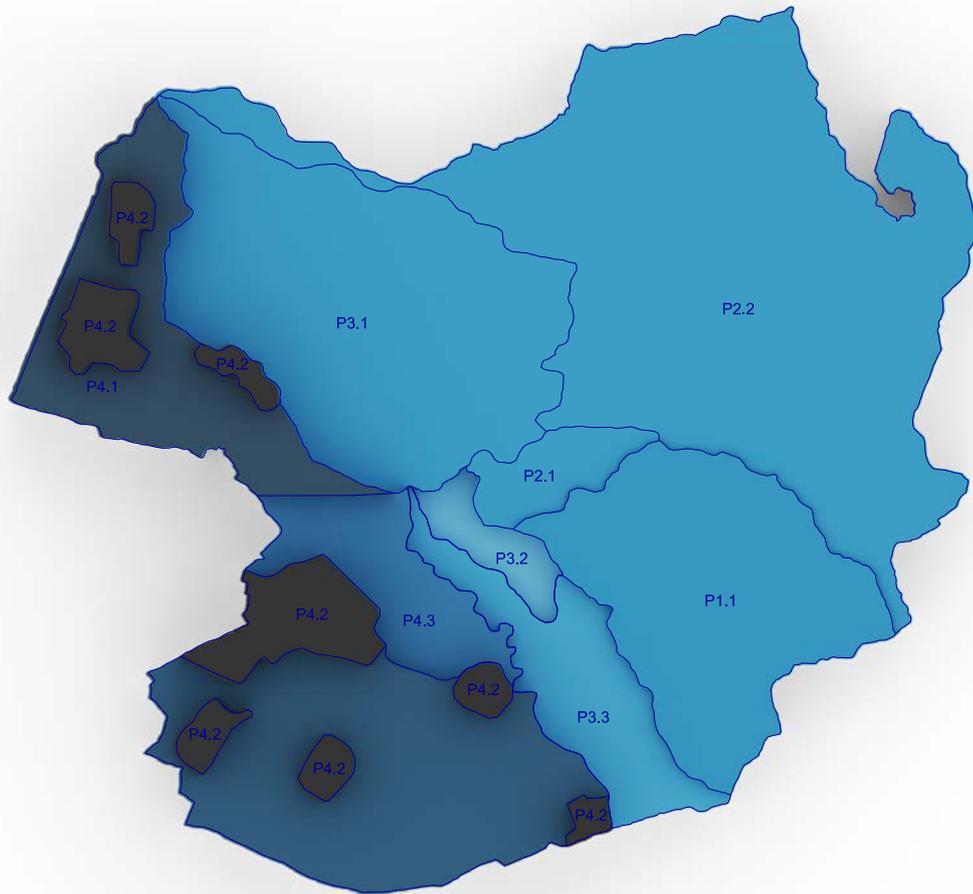
INTENSITY MODEL



IMPORTANCE OF THE RESOURCES



VULNERABILITY MAP



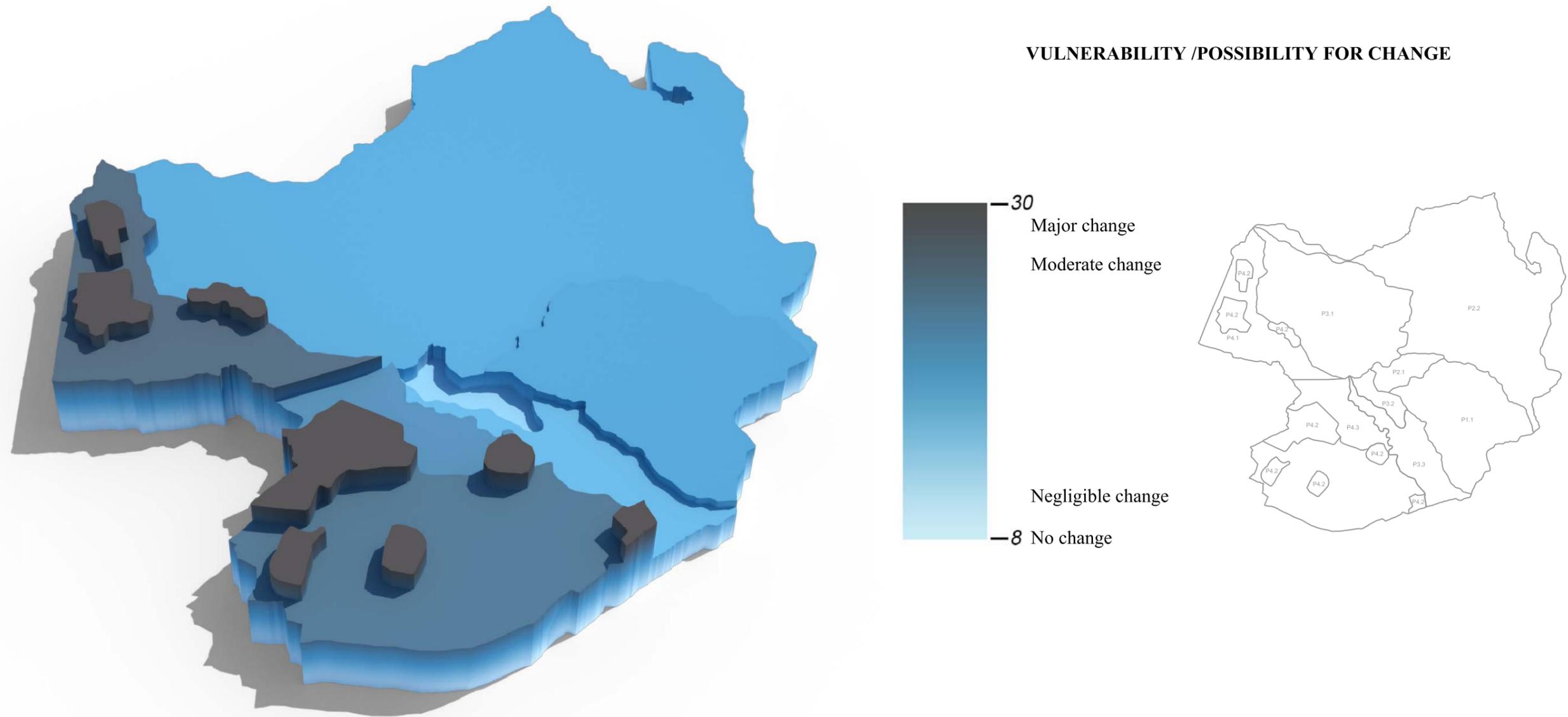
VULNERABILITY /POSSIBILITY FOR CHANGE



Major change
Moderate change
Negligible change
No change

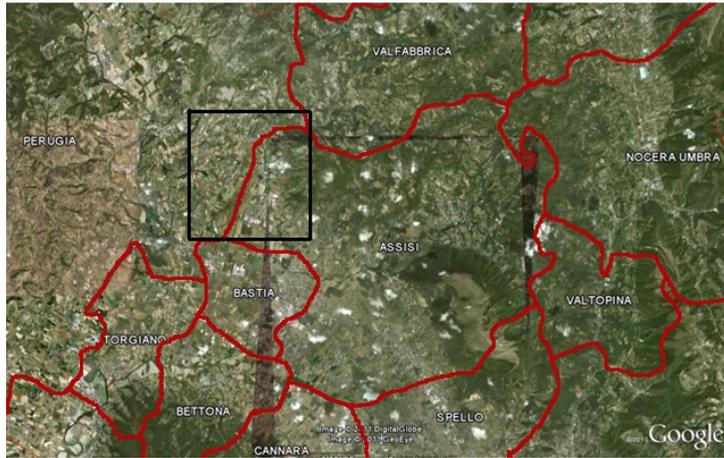


VULNERABILITY MODEL



Methodological approach to the conservation of HUL: the case of Assisi
 Check on restrictions and the existing planning in the surroundings

Assisi - Perugia



Assisi is bordered to the west with Perugia
 From the analysis of the planning instruments of the city of Perugia, there not seems to be areas of particular historical-architectonical interest in the vicinity of Assisi.

Table 5 - Perugia General Plan

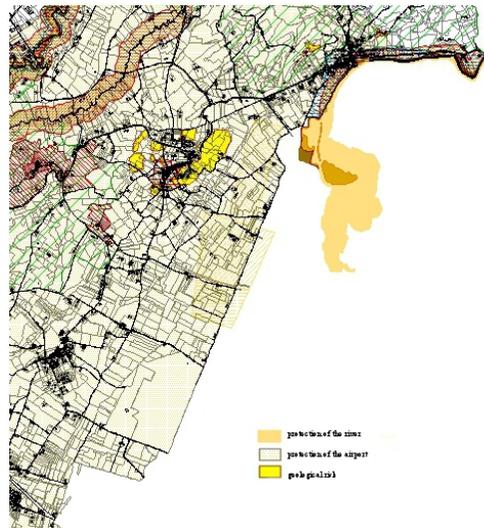


Table 7 - Perugia General Plan

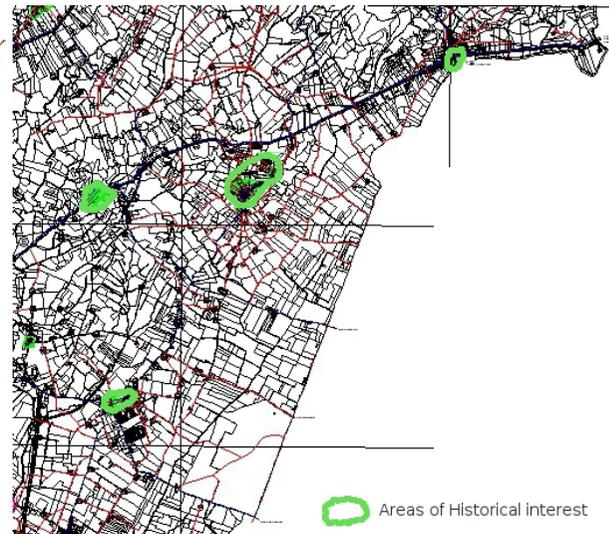


Table Ep 02 a - 2011 Assisi General Plan



Methodological approach to the conservation of HUL: the case of Assisi
Check on restrictions and the existing planning in the surroundings

Assisi - Bettona

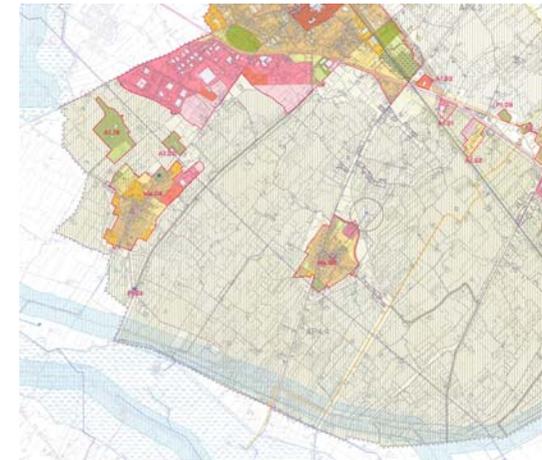
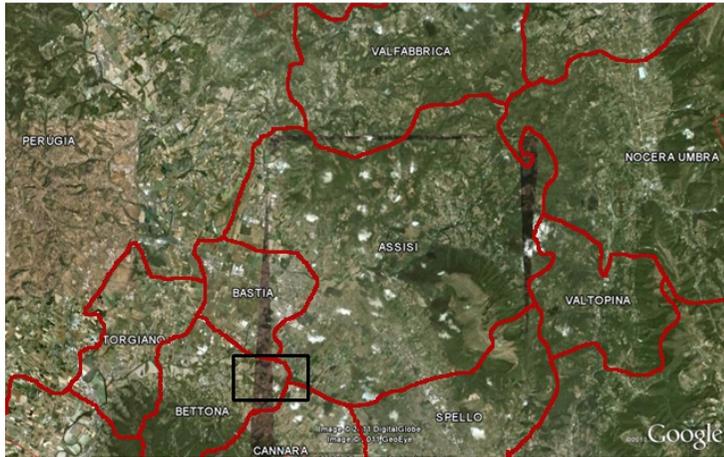


Table Ep 02.02 a - 2011 Assisi General Plan

Assisi is bordered to the south-west with Bettona. From the analysis of the planning instruments of the city of Bettona, there not seems to be areas of particular historical-architectonical interest in the vicinity of Assisi.



From Assisi to Bettona

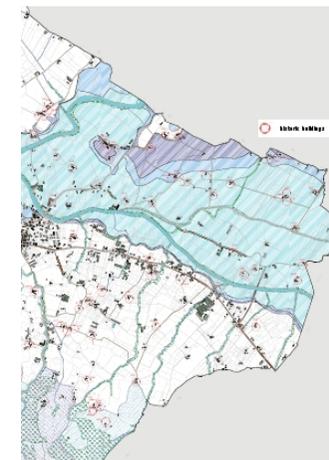


Table 03 - Bettona - The historical "values"

Methodological approach to the conservation of HUL: the case of Assisi
Check on restrictions and the existing planning in the surroundings

Assisi - Bastia Umbra

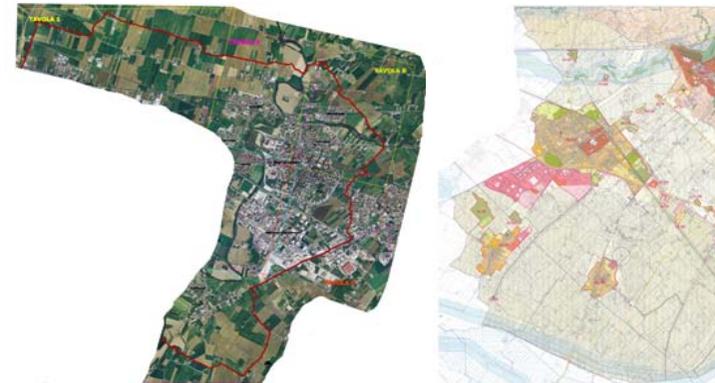
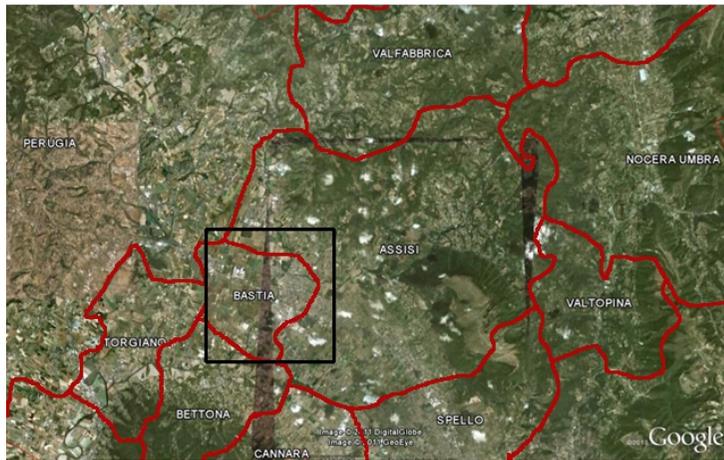
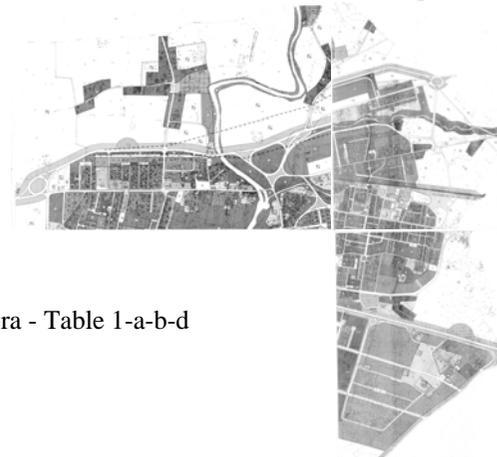


Table Ep 02.0 2 a - 2011 Assisi General Plan



Bastia Umbra - Table 1-a-b-d

Assisi is bordered to the west with Bastia Umbra.
From the analysis of the planning instruments of the city of Bastia Umbra, there not seems to be areas of particular historical-architectonical interest in the vicinity of Assisi.

Methodological approach to the conservation of HUL: the case of Assisi
Check on restrictions and the existing planning in the surroundings

17.3. GENERAL GUIDELINES FOR THE CONSERVATION AND DEVELOPMENT OF THE HUL: THE CASE OF ASSISI

17.3.1. General considerations

The identification of Assisi's resources and vulnerability enables us to outline an overall picture of the town.

A significant amount of recognised 'assets' relate to a religious dimension and Franciscan activities; even today, as in the past, the pull of Assisi is mainly connected to the figure of St Francis and his places of worship, therefore confirming the permanence of the historic role of the 'sanctuary town'. There are other established 'assets', which are mainly linked to tangible and intangible cultural heritage.

Cultural heritage and landscape

The cultural heritage of Assisi constitutes an asset of prime importance and is one of the key factors included on the World Heritage List.

Hit badly by an earthquake in 1997, the town underwent immediate, detailed restoration work, which has been completed. This work not only restored building structures but also involved the important development of existing cultural features, with the recovery of numerous monumental structures that had been abandoned and were unused.

In addition to the traditionally well-known monuments dating back to the Medieval and Renaissance periods, Assisi possesses a wealth of heritage that has still not been capitalised on fully, comprising archeological elements from Roman times including, in addition to the famous Tempio della Minerva, the Foro Romano, Domus, the amphitheatre and ruins of the town walls, which together constitute a potential resource of the utmost interest.

In recent years many of these objects have undergone important restoration work, even though there is still no single *Roman Assisi Project* which recognises the meaning of primary urban resource, and especially the aspect that plays an important role in the consolidation and enhancement of the overall urban structure.

Assisi constitutes one of the few examples in which the historic relationship between the walled town and its territory has been conserved almost completely, and

it is this latter aspect that determines the high quality of the site and expresses its universal significance.

From a morphological point of view, the historic centre has kept its integrity almost intact. By comparing maps and old photographs with current ones, we can see how the town within its 14th century boundary walls has kept its urban structure intact. The central urban area has remained unchanged over two millennia, just as the outline of some access roads to the forum square have largely remained unchanged.

The town outside the walls has however undergone extensive transformation, such as the construction of the railway line at the end of 19th century, which led to the first fragmentation of the Assisi plain, and the construction of the SS75 road in the 1960s.

Haphazard building in the hamlets during recent decades has also led to a urban landscape which has lost a good deal of its identifying characteristics.

From a functional point of view, as old photographs illustrate, the plain represents the appearance of the Assisi territory where the historic occupation of the land saw a change in use from land planted with trees to land with crops. Settlement, residential and production pressures mainly concern the urban centres along the main routes in the territory, linking to the regional road network (motorway), which merge centres together, which were once isolated.

Mount Subasio and the facing hills extending along all of the piedmont strip of the Mount Subasio and Asio slopes, and along the secondary ridges on the edges of the Chiascio, which were farmed from medieval times until present day, still constitute important heritage.

On the landscape housing the terraced slopes of the Asio and Subasio, the established use of the land sees the almost continual presence of olives arranged on banking or terraces.

The landscape of the irrigation plain under transformation (Petignano, S.M.degli Angeli, Rivortorto, Palazzo, Capodacqua) constitutes a series of distinct sections that demonstrate a transformation dynamic which has been accelerating in recent years.

A comparison between the Astengo PRG of 1958 and the current plan shows how the Assisi territory has kept its integrity in terms of land use. The wooded areas of the Subasio and the hill area, the olive cultivations at the foot of the hills, and the arable land on the plains still remain.

In terms of visual integrity, the countryside photograph taken of the whole Assisi territory, starting at the walled town and including the plains up to the municipal boundaries and even beyond, has enabled the drafting of a map in which the permanence of the integrity of views *from* and *towards* the walled town for a lengthy section is highlighted. Only around the hamlets on the plain (S.Maria degli Angeli, Rivotorto) and in those towards the area at the foot of the hills (Petignano, Palazzo), has visual integrity been compromised significantly following widespread, often disjointed, construction of buildings and warehouses. The same holds for the built-up area along the SS75 road.

The area behind Petignano, highlighted in brown on the visual integrity map, is the only one from which it is no longer possible to see the historic centre of Assisi.

All these areas, already significantly compromised from a urban point of view, should be considered carefully with regard to actions aimed at enhancing and re-establishing urban areas.

Social and demographic aspects

The socio-economic progress of the town demonstrates a picture characterised by demographic phenomena that have witnessed the fragmentation of families, the ageing of population, net active migration, the gradual reduction of the population of the walled town, and the growth of the town in the extended areas outside the walls.

It should also be highlighted that the residential buildings within the perimeter walls have almost all been renovated with the earthquake funds of 1997, without triggering a significant return of families to the centre.

Production activity

Production activity is mostly positioned along the SS75 and in the hamlets of Petignano, Palazzo and S.Maria degli Angeli.

The scarce protection of farming territory, with the reduction of areas specifically for farming activities, the disjointed transformation of existing buildings and the introduction of farming buildings with a high visual impact, not only reduce the scenic quality of the area but also affect the perception of product quality significantly.

Tourist supply and demand in the town

Current tourist demand in the territory can be split into three main segments:

- religious groups;
- religious groups of individuals;
- cultural and environmental groups of individuals.

Of all three the first, which involves organised pilgrimages and therefore low-profit tourism, is the most significant in percentage terms, as it accounts for almost 80% of total presence. However much presence is decreasing (from a maximum of 2.5 days per arrival in years gone by to a current average of 1.5 overnight stays) and is low profile, this tourist segment is an important strong point and as such must be kept.

The second segment (religious individuals) is mainly characterised by young people who frequent Assisi for retreats, conferences and spiritual exercises, with a marked tendency to come back to repeat the experience, ranging from one day's stay to several days.

Finally the third segment (individuals coming for cultural and environmental reasons) is characterised by tourists whose main reasons for their trip include the artistic heritage of the town, peace and quiet, and the countryside and landscape, and who are more inclined to spend and have an average stay of several days.

Hamlets

Hamlets are an important strategic resource for redefining the physical image of the whole municipal territory, however they are characterised by a tendency to be abandoned. They mainly comprise a central medieval core subsequently surrounded by a modern town, which developed in a random, non-uniform fashion.

Depopulation has occurred in the upland communities with the resulting loss of urban identity of most of the built-up area on the plains.

Many hamlets are subjected to a volume of traffic which is unsuitable for their structure, due to their position along major road networks, and are sometimes excessively isolated as regards the possibilities produced by the area.

With regard to Santa Maria degli Angeli in particular, it can be noted how the economic and urban processes of recent decades have transformed the structure considerably, characterising it with the appearance of a 'town of the plains', which has developed along the Perugia-Foligno thoroughfare.

Santa Maria degli Angeli has many aspects of strategic importance linked above all to its location, the concentration of services and infrastructure, the presence of production activities and the service sector, and the historic and cultural value of the centre. These resources are inserted in a urban context under transformation which still has many unresolved issues, in addition to generally poor quality architectural colours etc. Obviously the monuments of historical/artistic interest are an exception.

The presence of the SS75 creates a large split in the territory.

The same is true for Petrignano, situated east of municipal territory in the vicinity of the boundaries with Basta Umbra territory, whose central area is one which, in addition to the historic built-up area, the church, businesses and offices being localised, suffers the consequences of being the scene of a significant flow of vehicle traffic. In terms of economics, the area consolidates its demographic importance and assumes a significant territorial role due to the growth of the production sector and the presence of numerous activities linked to production.

For Palazzo the problems also basically depend on the unsuitability of the existing road network, in terms of its position and the amount of heavy traffic in the central area of Petrignano.

SWOT ANALYSIS

	Strengths	Weaknesses	Opportunity	Threats
General framework	<ul style="list-style-type: none"> - High value cultural, religious, urban, landscape, archeological and environmental heritage - High visibility of Assisi as a religious/cultural tourist town - Presence of important museums, features and national and international cultural institutions - High quality of life in urban centres and widespread sense of wellbeing - Little social conflict - Significant importance of business in the local economy - High level of farming production capacity and typical produce (wines and oil) - High capability of attracting migration flows - Employment level higher than the national average - Good training provision (with the decentralised department of the Faculty of Economics of Perugia) 	<ul style="list-style-type: none"> High amount of the population over 65 years old - Low quality accommodation - Limited use of endorsed quality brands - Local companies not inclined towards starting globalisation processes - Continual reduction over time in the number of residents in the historic centre - Presence of limited primary services in the historic centre - Risk of abandonment of cultivations on higher hill areas and emerging transformation pressures regarding existing building heritage and urban and rural landscape; - Lack of optimisation and promotion activities for lesser known urban and territorial places of worth; - Shortcomings relating to road infrastructure and logistics; - Little development of advanced service provision for the retail and marketing of local products; - Absence of up-to-date tourist guides 	<ul style="list-style-type: none"> - Significant potential for development of cultural/religious tourism sector - Optimisation of natural resources (Parco del Monte Subasio) - Favourable conditions for attracting foreign investment - Historic settlements of Franciscan centres and hubs widespread throughout the territory - Rural buildings which can be renovated for traditional purposes and optimised with new compatible economic activities (tourism, agritourism, centres for organic farming and the distribution of typical local products) 	<ul style="list-style-type: none"> - Population ageing significantly - Lack of generation turnover in farming - Risk of hydro-geological damage - Seismic risk - Significant dependency of the local economy on the tourist sector only
Cultural heritage	<ul style="list-style-type: none"> - High visibility of Assisi as a centre of excellence for religious and cultural tourism - Cultural, archeological and artistic heritage of great value (St Francis basilica etc.) - Strong cultural identity 	<ul style="list-style-type: none"> Limited public and private resources allocated for the protection and optimisation of existing historic/cultural heritage - Absence of up-to-date tourist guides especially following the earthquake in 1997 	<ul style="list-style-type: none"> - Very popular site in European cultural history - Significant existing interest at a European level in cultural and religious heritage - Historic settlements of Franciscan centres and hubs widespread 	<ul style="list-style-type: none"> - Risk to site integrity due to the effects of mass tourism

	<ul style="list-style-type: none"> - Presence of important museums, features and national and international cultural institutions (UN) - Centre of national and international social and cultural events 		throughout the territory	
Tourism	<ul style="list-style-type: none"> - Availability of numerous historic/religious/cultural sites of great attraction - Significant annual presence of visitors to the main places of worship - Excellent supply of natural environmental resources (Parco del Monte Subasio) 	<ul style="list-style-type: none"> - Low and medium category of accommodation establishments - Average length of stay: short (approx. 2.2 days) compared with regional and national average - Lack of structured relationships with tour operators experienced in cultural and longer stay tourist packages - Low level of recreational tourism development - Concentration of tourist flows in certain periods of the year (March-October) - Absence of up-to-date tourist guides especially following the earthquake in 1997 	<ul style="list-style-type: none"> - Worldwide expansion of tourist flows in the historic/cultural, environmental and business fields - Development of initiatives to enhance natural resources aimed at natural/environmental tourism - Presence of rural buildings which can be renovated for traditional purposes and/or new compatible economic activities (tourism, agritourism, centres for organic farming and the distribution of typical local products) 	<ul style="list-style-type: none"> - Competition from surrounding areas (especially Perugia) which are better equipped in terms of services and accommodation
Agriculture	<p>Quality of various products (PDO Assisi wines and PDO Umbrian olive oil, hills of Assisi-Spoleto sub-area) along with significant agritourism phenomenon</p> <ul style="list-style-type: none"> - Importance of farming in safeguarding the environment in deteriorated fringe areas 	<ul style="list-style-type: none"> - Significant ageing of the countryside - Modest profitability - Limited use of endorsed quality brands - Emerging settlement pressures in hill and plain farming areas - Risk of abandonment of cultivations on high hilly areas and transformation of historic farming layouts and grids in hill and plain areas. 	<ul style="list-style-type: none"> - Potential for income supplemented with agritourism - Increasing importance of organic farming - Consolidation of farming associations 	<ul style="list-style-type: none"> - Lack of generation turnover and resulting exodus of farming activity
Network of local services	<ul style="list-style-type: none"> - Good levels of public service provision (theatres, museums etc.) - Good supply of parking areas (even though they are mainly to meet tourist demand) - Significant presence of catering establishments 	<ul style="list-style-type: none"> - Predominance of goods transport by road - Presence of limited primary services for the resident population in the historic centre - Poor accessibility to some areas of the urban centre - Poor provision of road signs (to 	<ul style="list-style-type: none"> - Presence of various planning tools 	<ul style="list-style-type: none"> - Worsening of marginality in inner areas

		urban and tourist access areas)		
Local socio-economic system	<ul style="list-style-type: none"> - High levels of employment - Widespread sense of wellbeing - Predominant service sector (trade) - Little social conflict - Good integration of immigrants - Low crime levels 	<ul style="list-style-type: none"> - Continual reduction over time of the number of residents in the historic centre - Scarce and non-uniform distribution of basic services for people and companies in urban areas 	<ul style="list-style-type: none"> - Existing presence of high quality of life - Potential linked to the presence of a university department aimed at developing specialist training 	<ul style="list-style-type: none"> - Demographic decline and ageing of the population - Depopulation of the area and presence of families with small numbers - Shopkeepers' concerns over increased competition from large shopping centres
Industry, small businesses, and the service sector	<ul style="list-style-type: none"> - Presence of a strong services sector - Presence of a dynamic food/farming sector - Presence of small businesses with quality products and especially embroidery, wrought iron and stone, in addition to wood processing 	<ul style="list-style-type: none"> - Presence of a poorly-developed industrial and small business sector with the presence of small and very small businesses - Modest inclination towards globalisation - Gradual re-organisation of employment 	<ul style="list-style-type: none"> - Development of innovative, specialist departments researching regional sources of alternative energy 	<ul style="list-style-type: none"> - Possibility of reducing competitiveness margins of various manufacturing sectors due to competition in surrounding areas
Environment	<ul style="list-style-type: none"> - Good presence of natural protected areas - High presence of environmental cultural and urban resources 	<ul style="list-style-type: none"> - High chemical load on the land due to the use of fertilisers in farming 	<ul style="list-style-type: none"> - Presence of natural parks still not capitalised on (Parco del Monte Subasio) - Expansion of landscape and environmental tourist demand 	<ul style="list-style-type: none"> - Risk of hydro-geological damage - Seismic risk
Urban development	<ul style="list-style-type: none"> - maintenance of the structural, functional, and visual integrity of the Assisi territory in the vicinity of the walled town - presence in hamlets of the 'heart' of the settlement which can still be identified 	<ul style="list-style-type: none"> - Presence of areas disjointedly urbanised significantly (hamlets) - presence of insufficient urban infrastructure for circulation - loss of urban identity of hamlets 	<ul style="list-style-type: none"> - Possibility of modernising hamlets through integrated programmes that provide for practical development of the built-up area - possibility of enhancing various urban areas - possibility of enhancing ancient urban centres 	<ul style="list-style-type: none"> - loss of urban identity in hamlets and their original significance

17.3.2. The conservation and development of HUL

Assisi possesses hidden capital, a wealth of resources which are often not capitalised on very much, which could give rise to development that could support itself in harmony with the environment and the territory.

Landscape and environmental network in the municipality of Assisi is one of the most important resources to be protected and promoted in accordance with additional potential in the territory, such as artistic, historic and archeological heritage, the extensive Franciscan spiritual heritage, and crafts and production activity.

As a result, the whole territory can be considered as a resource to promote in its various environmental, cultural and settlement components.

With regard to hamlets, they require:

- the restoration and reinforcement of the identities of central areas, where the ancient nucleus comprising the castle was incorporated into modern buildings, therefore losing its original meaning of ‘heart’ of a settlement;
- the consolidation and modernisation of the residential setup with settlement completion and the identification of expansion areas with reorganisation work on the existing building;
- the reorganisation and rearrangement of craft and production activities;
- the incorporation of industrial and small business areas into the urban fabric to prevent functional segregation and isolation in outlying areas;
- an examination of the road network;
- the creation of networks and functional relationships that enable hamlets to become an integral part of the town.

Currently Assisi, with regard to the historic centre and more generally to the whole territory, is an inhabited place, where it is difficult to live because that system of relationships transforming residing into living has gradually got lost.

Unfortunately Assisi is generally inconvenient due to the lack of car parks, meeting places, areas and services for day-to-day living, even though it is universally known as a town of hospitality and brotherhood.

The starting point for setting the scene for the Assisi of the third millennium is a new urban concept which, based on the extraordinary qualities of the existing

historic and environmental network, becomes the means for developing quality settlements and architecture which is in harmony and consistent with the specific resources of the territory and the town.

Despite the significant importance that the town has now achieved at an international level, it struggles to find a urban identity that can denote it, not only as a global town of peace, but above all as a place to live, work and meditate.

A sequence of actions must therefore be implemented, and they are to be organised over several fact-finding and operational levels, through the setup of co-ordinated management systems within a single strategy that aims not only to achieve 'large projects', but also to construct and implement a network of targeted, detailed projects.

As a priority these initiatives will consist of a combination of solutions aiming at establishing single co-ordination of the set of territory resources, and a succession of proposals with a significant logistics impact with high environmental and architectural value, with special attention to the definition of the physical and material size of each urban transformation initiative.

A first group of initiatives must concern the improvement in quality of life for those who are the lifeblood of the town and its territory, i.e. its inhabitants and residents.

A second group will comprise a series of projects that enable the town to be endorsed as a place of culture, study and research, as well as knowledge and hospitality, which can make that jump in quality that Assisi lays claim to and deserves.

In general, urban-architectural action must be aimed at initiatives which are spread throughout the territory, organised according to a precise definition of general, strategic criteria aimed at the implementation of planning that gives preference to the search for quality with respect to symbolising quantities and constraints.

Finally, a word on production activity.

With regard to farming areas, neglecting to consider actions aimed at protecting and enhancing farming territory - with the reduction of areas specifically for farming activities and the disjointed transformation of existing buildings - and the introduction of farming buildings with a high visual impact, not only reduce the

scenic quality of the area but also affect the perception of local product quality significantly.

In other words, the optimisation of farming products cannot be separated from full protection of the farming landscape, without deterioration in the economy itself.

The retrieval of traditional farming activities and their modernisation, as it is necessary nowadays, would improve the identification of products associated with Assisi brands and their international promotion, for example Assisi's red wine, Sagrantino, or PDO oil, with a resulting direct impact on business activities in the town and smaller centres.

In the industrial sector the creation of low quality structures or structures which are not environmentally friendly should be opposed, especially the phenomenon of the continuous proliferation of exhibition buildings along the major thoroughfares, which invalidates their role as essential structures due to the perception of landscape quality, and significantly affects the quality of the visual experience, which has long been very high in the entire valley.

Another opportunity for optimisation regards tourist themes (for example sport and education), together with the participation of networks (theatres, sports and cultural groups).

17.4. CITY DEVELOPMENT STRATEGY (CDS)/ CITY CONSERVATION STRATEGY (CCS)

With regard to the possibility of urban development in the town, this must occur outside the historic centre, near the hamlets which are already seriously compromised.

Consequently, urban expansion could be assumed for the hamlets of Santa Maria degli Angeli, Petignano and Palazzo in particular, which are already compromised significantly due to widespread, random urbanisation, accompanied by the ultimate objective of modernising the existing structures.

To this effect the **City Development Strategy (CDS)/ City Conservation Strategy (CCS)** identifies the macro areas of expansion in the historic city, splitting the territory into:

- **areas which are strictly off-limits:** areas that include the historic centre, the area of the Subasio and the area at the foot of the hills. These are areas which are already sufficiently protected (legislative decree restriction 42/2004; special panoramas, SIC areas) where conservation measures are at maximum levels. Further building development would be undesirable in these areas, to avoid compromising the integrity and original character of the historic urban landscape.

- **areas with development opportunities:** these areas include the hamlets and thoroughfare next to the SS75, where widespread, disjointed building has seriously compromised the original characteristics of the historic urban landscape. The idea of sustainable development in these areas of the historic town means intervening on the existing structures by modernising them, in addition to creating new economic and social development opportunities for the town.

- **areas with development opportunities especially for the construction of high rise buildings:** these are the areas of Petignano, already seriously compromised in terms of visual integrity and from which the historic centre of Assisi is no longer visible, as highlighted on the visual integrity map.

- **already compromised areas that require careful planning, design and implementation:** these are the fringe areas of the hamlets, where the original characteristics of the historic urban landscape are still present but are partially compromised, or some urban sections along the railway line. In these areas

harmonisation and modernisation initiatives on the existing urban fabric could be considered.

- **partially intact areas that require careful planning, design and implementation**: these are the areas corresponding to the Assisi plains, that still have almost all of their original characteristics of historic urban landscape intact. The presence of scattered, disjointed constructions that spoil the visual integrity of the historic urban landscape in various points should be the subject of practical, organised planning that aims to rearrange the territory.

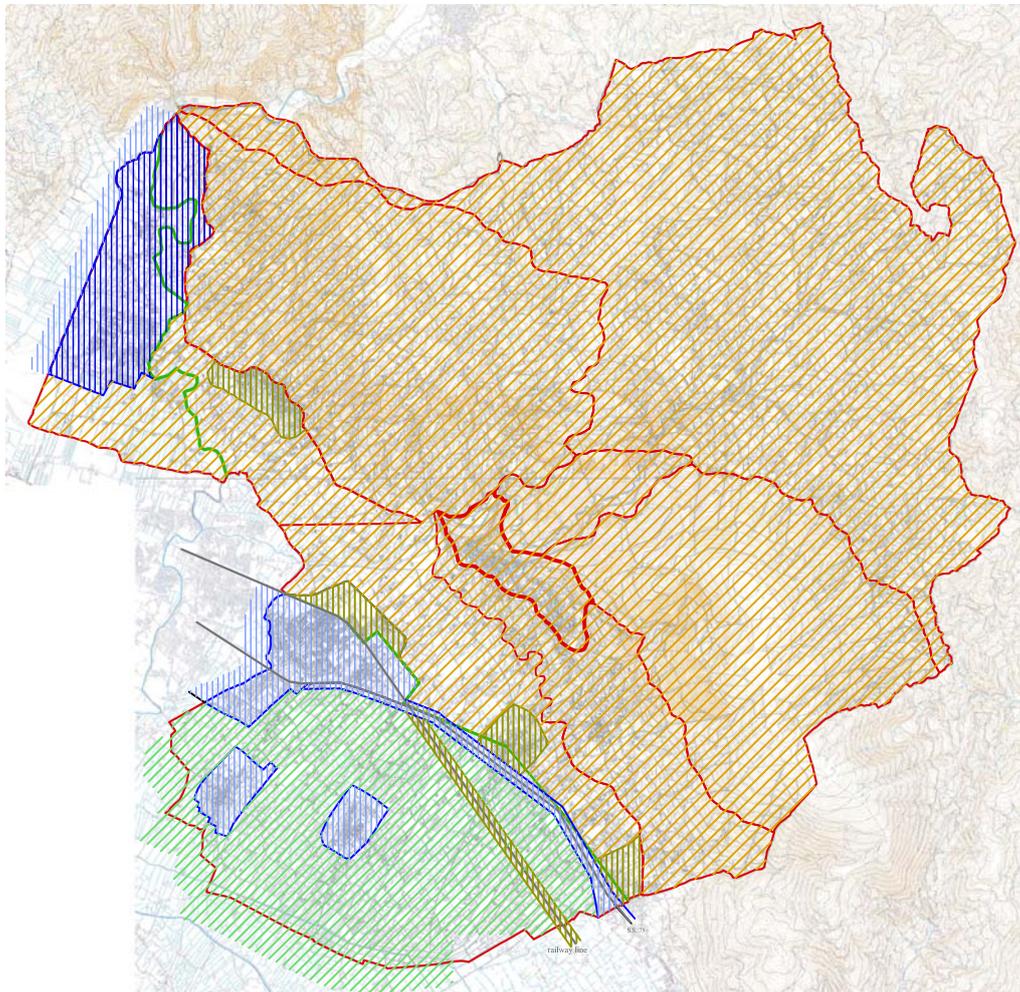
As already stated in the first part of this research, the strategies linked to conserving the HUL should be incorporated into the existing planning tools and it includes the idea on which the word **"conservation" of HUL includes "conservation ad development" and signifies to put more attention to the environmentally sustainable management and controlled development of areas forming the context/setting for the significant historic centre of Assisi .**

In the case of this town, the new General Town Plan and the Management Plan comprise two excellent examples of tools that already contain a practical starting point for identifying the area's resources and defining possible strategies for the sustainable development of the historic urban landscape.

These tools should be combined with considerations relating to HUL conservation/development.

Methodological approach to the conservation of HUL: the case of Assisi

PLAN of city development strategy (CDS)/ city conservation strategy (CCS)



-  strictly no-go areas
-  opportunities for development
-  opportunities for development, in particular for the construction of high buildings
-  already compromised areas that require attention to planning, design and implementation
-  partially intact areas that require careful attention to planning, design and implementation
-  border of the UNESCO Core zone
-  Assisi



18. METHODOLOGICAL APPROACH TO THE CONSERVATION OF HUL: THE CASE OF URBINO

18.1. Introduction: sources

The cartography and the reports comprising the Piano Regolatore of Urbino are the main source from which the information was taken to prepare *The methodological approach to the conservation of HUL of Urbino*.

The essential cartographic sources (all as hard copies, very often difficult to read and interpret as they consist of faded heliographic copies dating back to 1994) have been suitably reprocessed in digital format and subsequently summarised in relation to the need to obtain useful information in order to get to know and optimise the local resources.

Other essential additional sources for the study of the place and the preparation of the Methodological Approach to the conservation of HUL include the PTC of the Region Marche and the PTCP of the Province of Pesaro-Urbino.

More specifically, the latter have proved to be extremely useful in defining the area's natural and landscape resources.

As concerns the study of the aspects relating to the city's integrity, the consultation of material held in the IUAV Project Archives has proven to be essential, as these include the Giancarlo De Carlo fund in which the original documents relating to the Development Plan for the city of Urbino are held together with a great many other documented and photographic sources.

The research and inspections carried out *in loco*, with specific reference to the photographic campaign organised throughout the municipal territory also completed the analysis stage and proved to be essential in gaining more information on aspects connected above all with visual and functional relations between the different parts of the city.

In short, the sources used to prepare the Methodological Approach to the conservation of HUL in the case of Urbino, were:

- 1994 Urbino General Plan
- 1964 Urbino General Plan
- PTC Region Marche
- PTCP Province of Pesaro-Urbino

- IUAV Archival Projects ("Giancarlo De Carlo Fund")
- site surveys
- photographic survey
- internet sources
- for the definition of the intensity of resources/possibility for change: 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties

18.2. THE APPROACH

The methodological approach to the conservation of HUL in the case of Urbino includes the following points:

1. IDENTIFICATION AND STUDY OF THE GENERAL RESOURCES OF THE AREA

1.1. IDENTIFICATION/DESCRIPTION OF THE RESOURCES:

- protected areas
- hamlets
- landscapes
- archaeological resources
- castle, villas and towers
- mills

general resources: description and vulnerability

- The walled city :
 - buildings
 - the walls
 - green spaces
- resources linked to the integrity of HUL

Structural integrity: comparison of old and new cartography

Visual integrity: subdivision of the territory into 8 areas:

AREA 1

- the walled city
- views from the walled city
- landmarks of the walled city
- from the city to the landscape

AREA 2

- outside the walled city

AREA 3

- outside the walled city

AREA 4

- towards the industrial estate

AREA 5

- towards the industrial estate

AREA 6

- area of Maciolla

AREA 7

- area of Maciolla

AREA 8

- area of university colleges

1.2. DESCRIPTION OF THE IMPORTANCE OF THE RESOURCES WITHIN THE WHOLE CONTEXT OF THE CITY

Each resource has been described in relation to its importance in the whole context of the city and in relation to its importance with other resources

1.3. DESCRIPTION OF THE "VULNERABILITY" OF THE RESOURCES

As we have said above, the term "Vulnerability" means a condition of easy alteration or destruction of the characters marking the areas.

In this sense, the areas outside the historic centre or UNESCO perimeter are more vulnerable, as they are often insufficiently protected by town planning tools and it is here that it is appropriate to pay more careful attention to action taken with a view to development and conservation.

In the case of Urbino, the areas behind the historic centre have been involved in construction development since the 1964 PRG, and indeed still underway today, and are therefore the most vulnerable parts.

In these areas, the urban and infrastructural development of recent decades, and which is still underway, has partially resulted in the loss of the territory's identity, altering its intact visual panorama in some stretches.

The remainder of the territory, which is characterised by a very high level of landscape and environmental protection (scientific park, urban park, SCI, panoramic scenery, etc.), the original landscape character is preserved virtually intact.

2. DIVISION OF THE TERRITORY INTO MACRO-AREAS, SIMILAR AS FOR RESOURCES

The territory has been divided up into various macro-areas which have similar characteristics in terms of their morphology, structure, location, etc. and within which similar resources can be seen, as described below:

A1: Historic centre of Urbino

A2: Urban park

A3: urban areas around the historic centre (Campus, hospital, university etc.)

A4: craft and urban areas/hamlets

A5. Scientific Park

A6: panoramic views

A7: parks, forests, green areas

A8: parks subject to full protection

For each of these, the “dominant structure” has been identified and analysed in terms of its distinctive, physical-natural, historical-cultural, and social-economic components that cause the identifying character to emerge and enable the identification of the quality objectives to be pursued. In the division of the areas, careful attention has been paid to the protective restriction boundaries already in place (Scientific Park, Urban Park, Panoramic views etc.).

3. DEFINITION OF THE INTENSITY OF RESOURCES IN MACRO AREAS ACCORDING TO WELL-DEFINED STANDARDS OF EVALUATION

(ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

The intensity of resources in macro areas is defined according to standards of evaluation, as following:

• **IMPORTANCE OF RESOURCES:**

- Very High 5
- High 4
- Medium 3
- Low 2
- Negligible 1
- Unknown 0

1. Inscription on the World Heritage List

area wholly inscribed on the Core zone	Very High	5
area partly inscribed on the Core zone and partly on the Buffer zone	High	4
area wholly inscribed on the buffer zone	Medium	3
area partly inscribed on the buffer zone and partly out of it	Low	2
area not inscribed on the WHL	Negligible	1
Unknown area	Unknown	0

2. Protected areas

area wholly inscribed on Landscape bond+SCI or Landscape bond+Urban Park or Landscape bond+Scientific Park Panoramic views or Urban Park or Full protection	Very High	5
area wholly inscribed on Landscape bond	High	4
area partially inscribed on Landscape bond or SIC area or Urban Park or Scientific Park	Medium	3
area partially inscribed on 2 safeguard areas	Low	2
Area partially inscribed on 1 safeguard area	Negligible	1
Unknown area	Unknown	0

3. SCI-SPA

Area wholly on the SCI-SPA protection	Very High	5
Area almost entirely on the SCI-SPA protection	High	4
Area partially included on the SCI-SPA protection	Medium	3
Area partially included on the SCI or SPA protection	Low	2
Area not on the SCI-SPA protection	Negligible	1
Unknown area	Unknown	0

4. Hydrological system

Area with exceptional hydrological system	Very High	5
Area with high hydrological system	High	4
Area with medium hydrological system	Medium	3
Area with low hydrological system	Low	2
Area with negligible hydrological system	Negligible	1
Unknown area	Unknown	0

5. Landscape resources

Area with exceptional physical/natural resources	Very High	5
Area with high physical/natural resources	High	4
Area with medium physical/natural resources	Medium	3
Area with low physical/natural resources	Low	2
Area with negligible physical/natural resources	Negligible	1
Unknown area	Unknown	0

6. Ecological resources

Area wholly inserted on the most significant ecosystems	Very High	5
Area partly inserted on the primary ecological paths and partly inserted on the secondary ecological paths	High	4
Area wholly included on secondary ecological paths	Medium	3
Area partially inserted on secondary ecological paths	Low	2
Area on minor ecological paths	Negligible	1
Unknown area	Unknown	0

7. Botanical/vegetation resources

Area with exceptional botanical/vegetation resources	Very High	5
Area with high botanical/vegetation resources	High	4
Area with medium botanical/vegetation resources	Medium	3
Area with low botanical/vegetation resources	Low	2
Area with negligible botanical/vegetation resources	Negligible	1
Unknown area	Unknown	0

8. Historical/cultural resources

Area with exceptional historical/cultural resources (historic centre)	Very High	5
Area with high historical/cultural resources	High	4
Area with medium historical/cultural resources	Medium	3
Area with low historical/cultural resources	Low	2
Area with negligible historical/cultural resources	Negligible	1
Unknown area	Unknown	0

9. Land resources

Area with exceptional social-economic resources (production of DOC wine, olive groves etc.)	Very High	5
Area with high social-economic resources (partially inscribed on the production of DOC wine areas etc.)	High	4
Area with medium social-economic resources, without particular fine productions	Medium	3
Area with low social-economic resources	Low	2
Area with negligible social-economic resources	Negligible	1
Unknown area	Negligible	0

10. Visual integrity

Unspoiled area from the visual point of view	Very High	5
Area showing some variations from the visual point of view	High	4
Area showing some moderate variations from the visual point of view	Medium	3
Area showing high variations from the visual point of view	Low	2
Area highly damaged from the visual point of view	Negligible	1
Unknown area	Negligible	0

4. DEFINITION OF POSSIBILITY FOR CHANGE/VULNERABILITY OF RESOURCES ACCORDING TO WELL-DEFINED STANDARDS OF EVALUATION

(ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

- Unknown 0
- No change 1
- Negligible change 2
- Minor change 3
- Moderate change 4
- Major change 5

The possibility for change of each resource is in relation to the vulnerability.

This status is related to:

- the lack of protection laws
- the inadequacy of protection laws
- the particular conformation of the territory
- the particular natural or anthropic pressure in the territory (tourism, urbanization etc.) in relation both to the lack or to the inadequacy of protection laws

5. DRAFT OF AN INTENSITY PLAN IN ORDER TO IDENTIFY THE IMPORTANCE OF RESOURCES AND CONSEQUENTLY AREAS WHERE

IT IS POSSIBLE TO CALCULATE THE DEVELOPMENT AND AREAS IN WHICH SAFEGUARD IS NECESSARY

The intensity map uses different colours to define the areas in which resources have a greater weight and, vice versa, those in which resources are more scarce, where intervention is possible, establishing sustainable development.

The colour dark red/yellow is used on the intensity map to identify areas in which resources have a "greater weight" (or major intensity) and colors in tones of yellow for the areas in which resources have a "minor weight" (or minor intensity).

6. DRAFT VULNERABILITY PLAN

This is a map that, differently to the previous, defines the most vulnerable areas and therefore those most subject to change.

Light blue has been used to define the areas that have a minor vulnerability and dark blue for the areas that have a major vulnerability.

7. DRAFT ON AN INTENSITY/VULNERABILITY MODEL

It is a 3D model that shows the situation described above

8. DRAFT OF A "CITY DEVELOPMENT STRATEGY" (CDS) OR A "CITY CONSERVATION STRATEGY" (CCS) INCLUDING:

- strictly no-go areas
- opportunities for development, in particular for the construction of high buildings
- already compromised areas that require attention to planning, design and implementation

Generally speaking, and as already mentioned in the introduction, the territory of Urbino is characterised by a very high level of protection which, in addition to directed and full protection, also includes the Park regime.

The most vulnerable areas are those to the north of the historic centre and the artisan area of Casino Noci, marked by urban development that is still underway today.

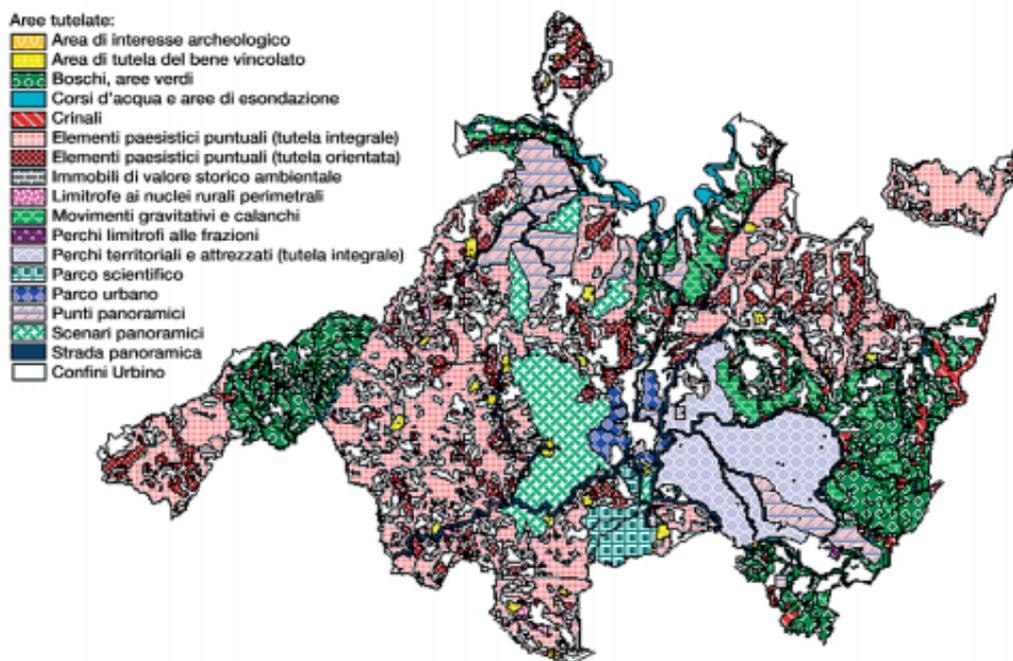
9. DEFINITION OF PRIORITY ACTIONS FOR CONSERVATION/DEVELOPMENT

Drafting of some general guidelines for the conservation and development of the historic city concerning the architectonic, social and environmental aspects, with specific regard to the areas that are less protected and therefore more easily subject to alteration or destruction of their distinctive traits.

The next few pages contain details of all the stages described above.

Identification / description of the resources

Protected areas



In accordance with the Environmental Landscape Plan for Le Marche Region, the PRG establishes three levels of territory and landscape protection:

- 1) Areas with limited protection status
- 2) Areas with full protection status, those with the most significant amount of landscape value which is typical of the Urbino area, and those areas which are more vulnerable from an environmental point of view; these should therefore be conserved and protected fully.
- 3) Areas with Park status (Territorial and Recreational Parks), those areas which, with landscape value worthy of being protected, can be organised individually to ensure the attainment of an improved ecological layout and simultaneously enable more worthwhile rooting of people throughout the territory, incentivising tourist activity which respects natural order, guiding farming activities, and promoting better woodland management.

Areas in municipal territory with *full protection* status include:

- important scenic ridges which define the main scenery and background to the Urbino landscape, and which are still basically intact;
- water courses and related overflow areas;
- woodland, pastures, natural and/or permanent grassland and wetlands;
- buffer areas delimited around historical centres, rural hubs, and structures identified as having cultural and historical interest
- scenic points, related views where significant
- areas at specific geological risk.

Furthermore, the PRG identifies panoramic scenery, namely those features which, due to the significant overlapping of landscape elements and the relationship between the various elements of the physical structure, and historical-cultural elements, give the location special value and therefore require full protection status.

The dominating panoramic scenery identified includes the following:

- the valley of Apsa San Donato in the last section before meeting the River Foglia;
- the slopes of Castel Cavallino towards the valley of Schieti and Romanino;
- the slope of Maciolla and Rancitella;
- the scenic road *la strada delle Capute*;

Areas in municipal territory with limited protection status include:

- ridges which don't have full protection status because they are less significant from a landscape point of view, or are already compromised significantly;
- archaeological areas and historical trails
- ridges at geological risk whose generic character permits some changes in use of the territory, with due caution;
- artificial grassland.

The network of *Parks* (territorial and recreational), which constitutes the real new framework of the territory, performs the double role of providing environmental protection throughout the territory and permitting a series of 'gentle' activities whose impact on the environment can be controlled. Territorial and Recreational Parks are implemented through the approval of detailed plans drawn up on the basis of project guidelines.

The *Territorial Parks* include:

- Parco delle Cesane: this is a vast area that includes the south-eastern part of municipal territory. The Park starts at the boundary with the historical centre (access from the Convento degli Zoccolanti) and reaches the municipality boundaries towards Fermignano, Fossombrone and Isola del Piano, and joins up with the Riserva del Furlo; it also includes the entire section of the River Metauro, in the section where it crosses municipal territory;
- Parco del Foglia e di Pallino: includes the north-eastern part of municipal territory. The Park unwinds along the Foglia and its tributary Apsa, and extends towards Urbino next to Pallino and Ca Staccolo, until it skirts the northern perimeter of the chief town; the park includes the Oasi della Badia;
- Parco di San Lorenzo in Cerquetobono: includes the western part of municipal territory, and occupies all the territory included between the valley of Apsa and the provincial road for Lunano and Sassocorvaro.

The *Recreational Parks* in the Municipality of Urbino include:

- the Scientific Park: includes the southern part of municipal territory, from Urbino up to the boundary with Fermignano, and unwinds along the 'Red Road'.

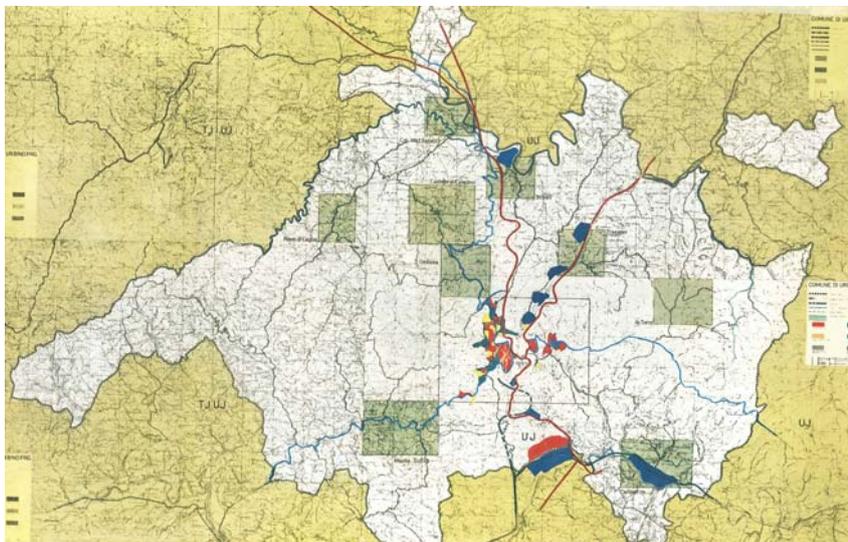
This Park is dedicated specifically to safeguarding the environment with regard to the area facing Urbino (Sogesta ridge), the creation of a University science department, and the creation of closely connected minor production structures.

- The Urban Park: surrounds Urbino at the sides to the West and East, and connects to the South with the Scientific Park and to the North with the Territorial Park of Foglia. This Park acts as a boundary around the historical town and its recent perimeter, and organises the areas on the fringes of the built-up area into a unitary green area, rich with adjoining features.

Parks and panoramic scenery constitute a network of protected areas with limited and full protection status respectively, covering approximately 80% of Urbino territory; the general landscape protection framework proposed by the PRG is completed by the identification of special scenic points (also with full protection status) placed along the main roads accessing the Historical Centre and in park areas or other areas already classed as panoramic scenery; special strategies have been put in place for these locations, to protect the scenery and suitably equip stopping places.

Identification / description of the resources

Hamlets



The main hamlets of Urbino are Gadana, Pieve di Cagna, Trasanni, La Torre, and Canavaccio.

These fractions have just a few hundred inhabitants, and the main activity involves farming with the development of some agritourism businesses in recent years. The General Town Plan (PRG) of 1994 stifled the development of hamlets with respect to concentrated building in the environs of Urbino. The PRG states: “The Plan has taken as lost all those hamlets that cannot survive because they do not possess activities which are capable of development, or given that they are cut off from the main lines of communication they do not have the possibility of having them in future. For the small number of social groups that will still occupy the suburban hamlets in the near future, the services required to achieve minimum decent levels at least shall be provided; however no significant public investment should be directed at those areas, either for the housing sector or the road network. Once the necessary repair work to impassable routes has been completed, the existing roads will be sufficient for local needs. The areas concerned include Schieti, Gadana, Trasanni, and Canavaccio, in addition to the immediate area surrounding Urbino, where the Plan has provided for residential allocations and also industrial localisation.”

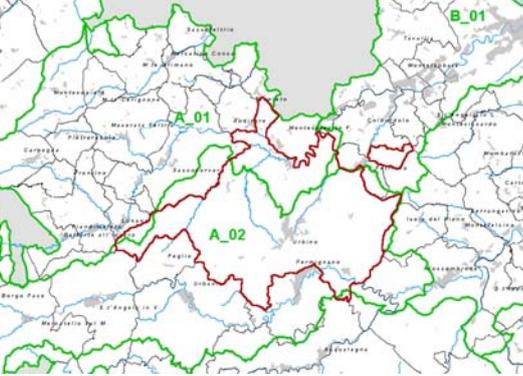
In the 5-year period from '85-'89 a substantial balance can be noted between residential building activity in the hamlets overall and in Urbino, both in terms of the number of permits issued and the actual volume constructed, therefore indicating a certain uniform type of building projects. When assessed over the '85-'97 period however this figure changes, as the number of permits issued in the hamlets is much higher compared with the number of permits for Urbino (72% against 28%), with an almost equal volume. This figure indicates project fragmentation in the hamlets, into smaller units that relate to detached/semi-detached construction. In the chief town though the figures reveal intensive construction; to all effects the greatest number of constructions in the second assessed period concerned the Piantata council housing estate and the Tortorina tourist accommodation area.

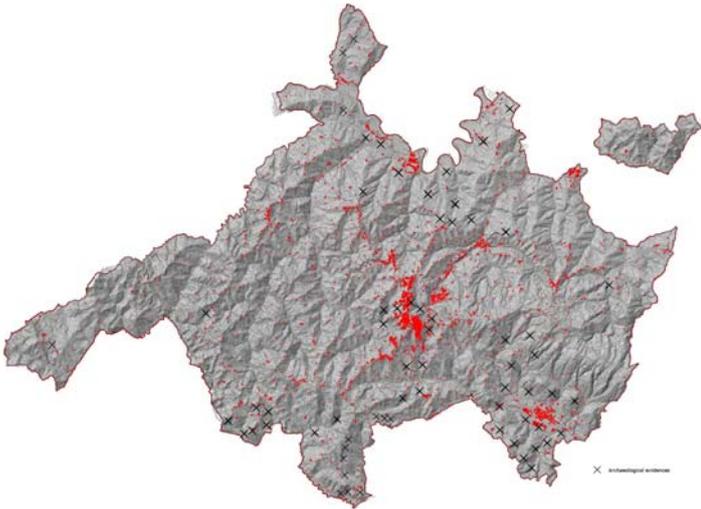
With regard to production activity, in the five year period from '85-'89, building in the hamlets was definitely predominant compared with the chief town (90% of the total area covered). In the '85-'97 period there was a percentage increase in production activity in Urbino amounting to 24% of total area covered; this increase coincides with the completion of the Casino Noci and Fontesecca industrial estates. The trend for greater production activity in the hamlets is verified (74%).

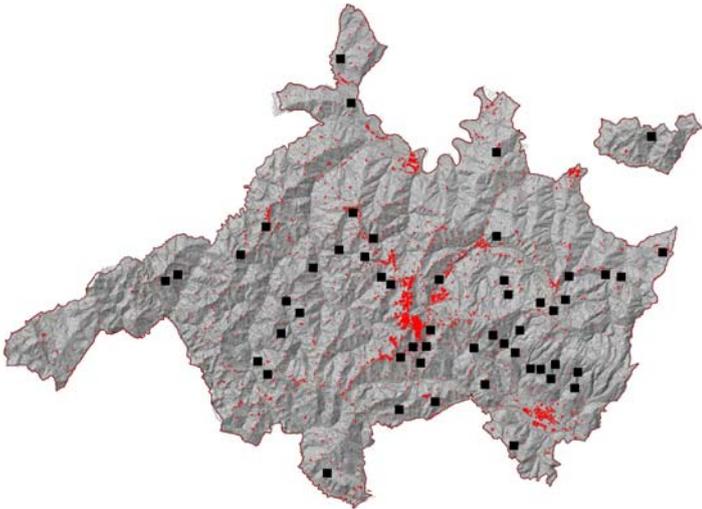
Sources:

G. De Carlo General Plan, 1994, pg 115

Long-term Implementation Plan 98 – 2002, adopted with Civil Code Resolution no. 68 of 15.09.1998 and approved definitively with Delibera CC no. 4 of 22.01.1999.

Identification / description of the resources
<p>Landscapes</p>

<p>The landscape that surrounds Urbino is characterised by the presence of flourishing hills with alternating rows of trees and ploughed fields. It is still very similar to the landscape depicted by Piero della Francesca in his painting The Baptism of Christ, dated between 1448 and 1450 and kept at the National Gallery in London. The territory of the Urbino dukedom and the high valley of Metauro, rich with natural features of historical-architectural value, is characterised by the presence of small districts, with collective rural characteristics still linked to ancient trades based on the use of natural resources. Federico da Montefeltro characterised this territory significantly, merging the town and adjacent countryside around his court, prevailing over the Malatesta family of Rimini. Urbino marked this land significantly with an extraordinary concentration of beautiful houses, exclusive residences, medieval towers and excellent rural architecture.</p> <p>Urbino Municipality extends over 3 sections of landscape as identified in the Environmental Landscape Plan for Le Marche Region.</p> <p>ENVIRONMENT A01 - Mount Carpegna and the high valleys of Conca and Foglia Structured on the basins of Alto Foglia and Alto Conca the territory in this environment takes the marly-arenaceous complex of Mount Carpegna and the calcareous stones of Simone and Simoncello as its morphological reference and identifying feature. The scattering of minor centres spread along the south-eastern slopes of the hill combines with the linear settlements on the valley floor. Macerata Feltria and Sassocorvaro constitute the main centres in the network of settlements. Arable land at 39% dominates over the extension of woodland, which is equivalent to 28% of the territory's surface.</p> <p>ENVIRONMENT A02 - The Urbino area and the high valley of Metauro Basically structured on the valley of Alto Metauro extending from the Cesane mountains to the Alpe della Luna, the territory of this environment is characterised by the town of Urbino immersed in high hilly agricultural landscape of particular scenic value, in addition to an urbanised system along the valley floor, organised in a discontinuous fashion from Fermignano to Borgo Pace. The Cesane mountains are characterised by hilly slopes which are partially cultivated and partially covered with woods of varying origin. Next to the woods of pubescent oak and European hop hornbeam, the topsoil of anthropic origin resulting from reforestation activities started during the First World War is widely represented, with the planting of a very high number of conifer species which are mainly black Austrian pine. Even with the contribution of non-autochthonous populations, the Cesane re-acquired a 'woodland' appearance after a very long period where farming landscape prevailed, following gradual deforestation to acquire farming areas. There is extensive woodland covering 42% of the territory's surface; miscellaneous arable planting covers 28%.</p> <p>ENVIRONMENT B01 - The Pesaro area There is a significant amount of miscellaneous cultivations covering 40% of the territory's surface, followed by arable planting at 36%.</p>

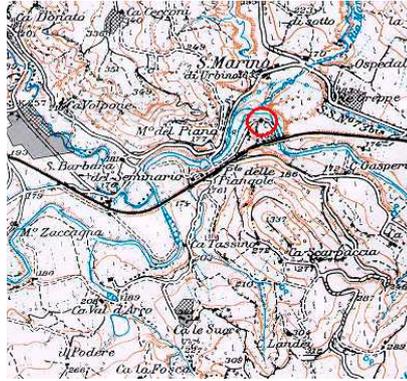
<p>Identification / description of the resources</p>
<p>Archaeological resources</p>

<p>Archaeological research, carried out in the area after the ploughing season and during occasional work, made it possible to gather substantial documentation such as to provide sufficient data for recognising the characteristics of the area's population in essential lines. In most cases it regards the ruins of farms of limited size. Archaeological documentation indicates a scattered spread of the population in relation to agricultural use of the area, both during the last century of the Republican period (3rd -1st century BC) and in the initial centuries of the Empire. A gradual decrease in the number of rural buildings could already be noted in the 3rd century AC, which became more marked in the two subsequent centuries. There is little evidence for the 5th century AC and the 6th to 7th, due to demographic reduction and the collapse of the economy as a result of the Barbarian Invasions and the war between the Goths and Byzantines. The size of the population during medieval times can be assessed indirectly on the basis of the network of parish churches and chapels in the Urbino area, or religious meeting centres which rural communities gravitated towards. Basically, population lines of continuity between Ancient times and the Middle Ages are widespread and dominant in hill areas and on the outskirts of the valleys.</p>

<p>Identification / description of the resources</p>
<p>Castles, ville and towers</p>

<p>Between the 12th and the 13th century the considerable demographic growth which was occurring throughout Europe brought about considerable displacements of the population towards towns and cities. Built-up centres were surrounded by walls and split into residential areas, fields and Roman camps (Civitates, terrae & castra). Settlements of serfs and colonies spread throughout the countryside; they settled in strategic points of the territory, using existing old towers. On other occasions they settled in locations which enabled watch over the territory, by constructing walled houses, with watch towers and multi-use towers, hubs to which the name castle (castra) is accredited. The castle system remained unchanged even during the times of the signories, sporadic watchtowers were added at the most, which operated as an agricultural/military outpost. The towers were distributed throughout the territory creating a defence network over the main roads.</p> <p>In addition to the urban hierarchy outlined above there were the estates (villae), smaller rural hubs which weren't fortified and sometimes constituted a block of dwellings in the neighbourhood or on the main road, serving as landmarks for houses scattered about and houses connecting with larger centres. The dukedom statutes of 1350, which were updated mid-16th century, outline the castles and their respective distances from towns in the first book.</p>

Identification / description of the resources

Mills

Molino della Grotta



The first documents found on the *Molino della Grotta* date back to the first half of the 1500s. The owners were Stefano Santucci with 5/12 and Donna Nicolosa Bedinuzi with 7/12, the latter share passing to her daughter Clara and then in 1594, to the congregation of S. Giuseppe of Urbino. In 1609 these 7/12 belonged to Francesco Vannucci. In 1632 Vincenza Santucci, heir of Stefano, ceded the nearby *Molino del Piano* and his share of the *Molino della Grotta* to the Ven. Fraternita di S. Maria della Misericordia of Urbino. In 1640 they also acquired the remaining part belonging to the Vannucci heirs. Until 1640 the *Molino della Grotta* granted the *Molino del Piano* quarts of grain per year for being able to use the water. The mill had a grinder and a textile fulling machine. In the second half of the 1800s a second grinder was installed and a small mill for colours. In 1906 the mill stopped operating due to the dam breaking and didn't resume operation.

Molino Gulla



This is a mill formed by three distinct buildings, arranged in series one above the other, on the slope of the left bank of the Fosso dei Cavaticci. The mill stopped operating in 1943 and since then has not had the grinders and other milling equipment. It was powered by a channel still in existence, which reached the upper mill. From here the falling water powered the three grinders, once for each building: the first for corn, the second for grain, and the third for acorns.

Identification / description of the resources

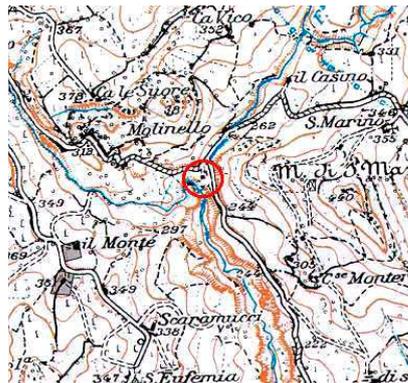
Mills

Mulinaccio



The term ‘*Molinaccio*’ was given to buildings in ruins, as this building was before it was renovated for residential use. Here we have a beautiful stone building during the restoration and renovation phase (1998), which has partially retained the original mill characteristics. There is an important internal central shaft, open at the top, where a large water-powered vertical wheel was housed, which is no longer there. The large millpond a little away from the house is worth noting, which is bordered by a high stone wall in the direction of the house and on the side of the nearby ditch, which has also been restored. The millpond is full of water coming from an open channel which departs from the Fosso di Cavaticci.

Molinello di Sotto



This mill is made up of various works buildings, and was partially renovated but not inhabited. It stands on a high crag where the Fosso dei Molinelli, with limited inclination up to here, first skirts the house then flows from the vertical bank. The entrance of the gearing shaft opens on the crag side.

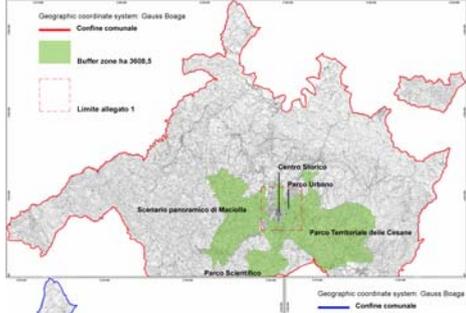
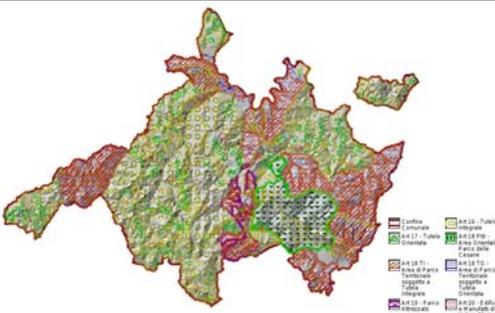
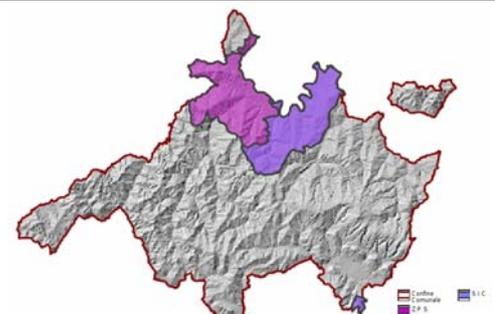
Identification / description of the resources

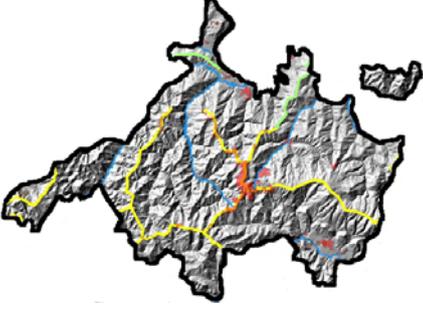
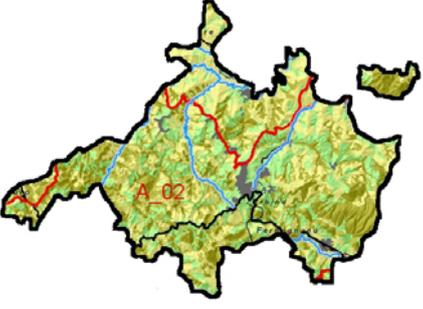
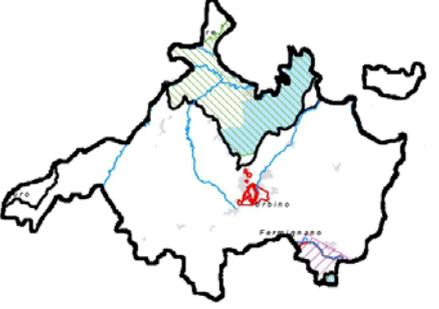
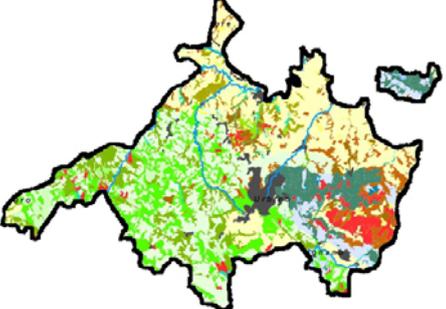
Mills

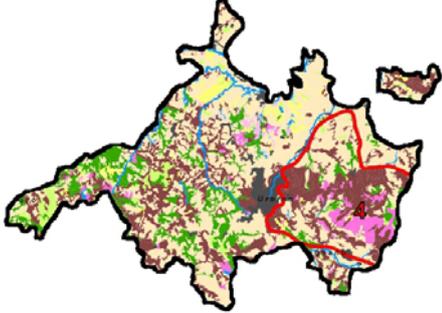
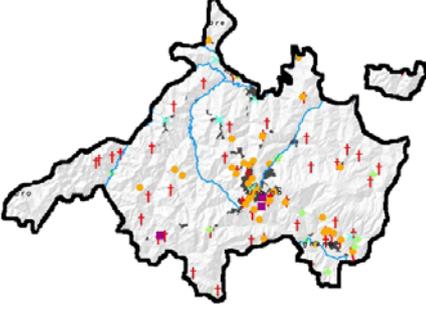
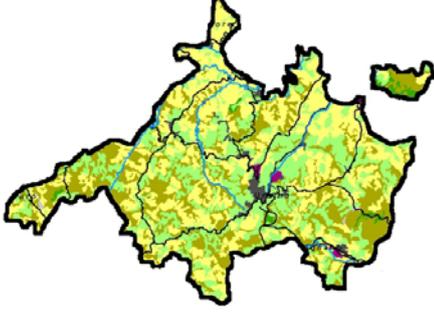
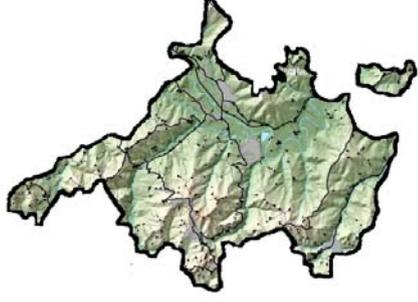
Molinello di Sopra

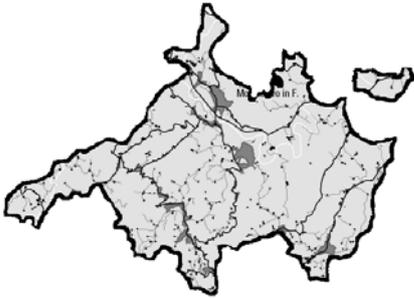
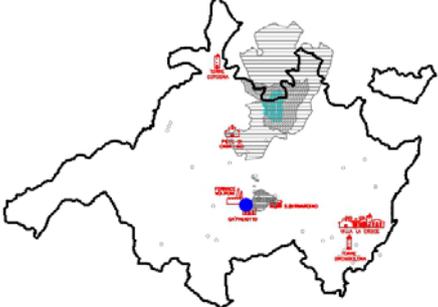
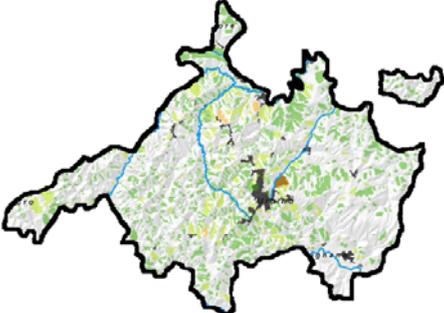


In 1996 the building was still standing, even though it was partially in ruins; in 1998 it was brought down due to the danger which arose from its proximity to the road, and just a part of the perimeter walls remains. It operated until the '40s; currently the supply channel is no longer present, which started in the similarly named ditch, which flows in front of the mill.

Description of the vulnerability of the resources	
Protected areas	
Description/Vulnerability	
 <p>Protected areas/Parks</p>	<p>The Urbino PRG has established three levels of territory and landscape protection:</p> <ol style="list-style-type: none"> 1) Areas with limited protection status; 2) Areas with full protection status; 3) Areas with Park status (Territorial and Recreational Parks). <p>Areas in municipal territory with full protection status include:</p> <ul style="list-style-type: none"> • important scenic ridges; • water courses and related overflow areas; • woodland, pastures, natural and/or permanent grassland and wetlands; • buffer areas bordering historical centres, rural hubs, and structures identified as having cultural and historical interest • scenic points, and their visual cones, where significant • areas at specific geological risk. <p>Furthermore, the PRG has identified panoramic scenery which includes:</p> <ul style="list-style-type: none"> • the valley of Apsa San Donato in its last section before meeting the River Foglia; • the slopes of Castel Cavallino towards the valley of Schieti and Romanino; • the slope of Maciolla and Rancitella; • the scenic road <i>la strada delle Capute</i>;
 <p>Areas subject to full/oriented protection and Parks</p>	<p>Areas in municipal territory with limited protection status include:</p> <ul style="list-style-type: none"> • ridges which don't have full protection status • archaeological areas and historical trails • ridges at geological risk whose generic character permits some changes in use of the territory, with due caution; • artificial grassland.
 <p>Areas subject to protection by Dlgs 42/2004</p>	<p>The Park network (territorial and recreational) includes:</p> <ul style="list-style-type: none"> • Parco delle Cesane • Parco del Foglia e di Pallino • Parco di San Lorenzo in Cerquetobono
 <p>Areas SIC and ZPS</p>	<p>The Recreational Parks in the Municipality of Urbino include:</p> <ul style="list-style-type: none"> • the Scientific Park • the urban park • Parks and panoramic scenery <p>Historical road network</p> <p>With regard to the road network, it can be stated that, in general, routes adhere to the</p>

Description of the vulnerability of the resources	
NATURAL RESOURCES	
Description/Vulnerability	
 <p>The morphologic and hydrographic structure</p>	<p>morphology of the land they cross, and adapt to the shape of the hills and valleys, avoiding natural obstacles and human intervention as much as possible. As a result the minor road network connecting the town and settlements scattered around the territory has mostly remained in use throughout the centuries up until present day. Proof of the existence of life along many of these roads is provided by the discovery of Roman graveyards situated along the route.</p>
 <p>The landscape and territorial structure</p>	<p>Population and production</p> <p>From the '60s onwards, when the farming exodus became more significant, the municipality started to lose its population - this ongoing erosion leading to an all-time minimum level in the '90s. The decrease in population corresponded to the abandonment of farmhouses scattered throughout the territory, and especially those far away from link roads; however the land, apart from the least practical areas, continues to be farmed today with grain and fodder, and sorghum and sunflower on and off, which is almost all destined for export outside the municipality and outside the region.</p>
 <p>Areas of particular landscape interest</p>	<p>Arable land covers 15,175 of the 22,800 hectares in the territory. Woodland (4850 ha), meadows and grassland are scarce (840 ha) and timber and specialist plantations are almost non-existent (130 ha). Grapevines prevail among fruit trees. The amount of livestock is insignificant. Agricultural and industrial production installations are reduced in number and size. Farming activity is typical of a marginal farming economy. The considerable sloping of the land, its mainly clay structure, and the lack of defined production traditions, has led to farming based on cereals and fodder rotated with crop changes, implemented periodically in search of more lucrative market outlets.</p>
 <p>The structure of ecosystems</p>	<p>These cereal/fodder productions are not re-employed directly by agricultural companies, as in recent years cattle breeding has ended almost completely.</p>

Description of the vulnerability of the resources	
NATURAL AND HISTORICAL RESOURCES	
Description/Vulnerability	
 <p>The botanical vegetation system</p>	<p>Only sheep farming completes its production cycle, cultivating fodder and selling the transformed product (dairy products). Durum wheat is widely grown, as are wheat and the production of alfalfa.</p> <p>Main strengths in relation to the botanical, ecological and rural landscape network:</p> <ul style="list-style-type: none"> - Presence of territories characterised by natural/semi-natural habitats with high level of biodiversity (grassland, woods) - High level of vegetation diversity - High level of territory morphology diversity - Quality and spread of forest landscape - Significant presence of natural protected areas and <i>Rete Natura 2000</i> sites and protected flora areas - Presence of associations in pasture/forestry environment - Diversified supply of natural and environmental resources, and quality forest and farming products - Widespread tourist attractions on the territory
 <p>The historical architectural heritage</p>	<p>Main strengths in relation to the cultural heritage network:</p> <ul style="list-style-type: none"> - Presence of a historical centre with a high amount of cultural, historical value - Existence of fortifications, fortresses and castles, towers, archaeological ruins - Existence of mill network and other industrial archaeological buildings (ex Fornace Volponi)
 <p>The land use</p>	<p>Main strengths in relation to visual/identification aspect</p> <ul style="list-style-type: none"> - Presence of panoramic scenery and views - Historical centre as an architectural landmark <p>The main weaknesses are:</p> <ul style="list-style-type: none"> - Abandonment of farming land in the higher hills and mountain area, in favour of spontaneous colonisation of forest species over crops, pastures and clearings with resulting decrease in ecotones and decrease in biodiversity. - Scarce active management of agrosilvopastoral territory management
 <p>Morphologic relations</p>	<ul style="list-style-type: none"> - High spread of hydro-geological instability (erosion and gravitational phenomenon) - Scarce generation turnover of rural and mountain populations and little inclination for management, structural and production adaptation (e.g. forms of combined management)

Description of the vulnerability of the resources	
NATURAL AND HISTORICAL RESOURCES	
Description/Vulnerability	
 <p>Settlements</p>	<ul style="list-style-type: none"> - Presence of formations of mainly alien conifers (old reforestation and mainly monospecific and geometric) - Fragmentation and scattering of production units and reduced company dimension - Abandonment of minor settlements, towers and mills: - Little awareness in urban populations of active sustainable management of agrosilvopastoral and environmental resources. - Increase in hydrogeological risk and danger due to neglect, or agricultural-water and forest arrangements not being created.
 <p>Settlements</p>	<ul style="list-style-type: none"> - Spontaneous colonisation of forest species over crops, pastures and grassland with resulting decrease of ecotones and decrease in biodiversity. - Increase in agrosilvopastoral areas without management and related ecological, socio-economic and cultural problems (increased fire risk, hydrogeological instability, plant disease). - Ageing of woodland mixed with loss of biodiversity, loss of typical agrosilvopastoral production, traditions and local knowledge etc.) - Increase in reliance on abroad or on other areas (away from processing and use ones) for the supply of timber products
 <p>Risks</p>	<ul style="list-style-type: none"> - Development of recent settlement and industrial areas around monumental buildings. - Loss of minor settlements.

Identification / description of the resources

The walled city - Buildings



Piazza del Rinascimento is a slightly sloping long, narrow area, bordered on one of its larger sides by the side of the Palazzo Ducale Dei Montefeltro. On the opposite side, at the lowest point, is the 14th century San Domenico Church, followed by a line of buildings which is eventually interrupted by the significant projection of the University building, the ancient Montefeltro residence. Opposite San Domenico Church a small Egyptian obelisk marks the start of the square without interrupting spatial continuity with the adjoining Piazza Duca Federico, defined by the famous winged façade of Palazzo Ducale and the porticoed side of the Cathedral, which is a large neoclassical Valadier construction. The combination of the two squares does not seem to have been a deliberate design, as is the case with lots of Renaissance squares, yet the size, atmosphere, and practical layout, which are reminiscent of that period, have rarely been so evident.

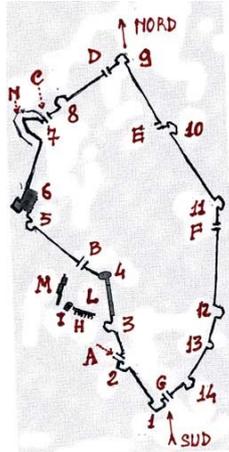
An argument for this is the presence of Laurana's masterpiece, Palazzo Ducale dei Montefeltro. Its plain, linear, clearly square structure with only the doors and large windows providing decoration and monumentality, dominates the surrounding area, defining the structure and volumetric relationships. The concept of a square, as a series of elements that contribute to defining an environment, seems to have been turned on its head here, and is influenced by one monument which, with its supreme beauty, retains and expresses every aesthetic and atmospheric value, presenting itself as the ultimate protagonist.

Piazza Mercatale is a vast flat artificial quadrilateral formed by filling a hollow in the 19th century. Its name comes from the fact that it was originally the location of the cattle market, as well as having other uses, such as in 1837 when a wooden amphitheatre was built for tombola, illuminations, jockey races, a bullfighting-style event, and the launch of hot-air balloons, for the Feast of San Crescentino (patron saint of Urbino). After the Second World War and with the arrival of motor vehicles, an underground garage and ground level car park were built. Albornoz fortress was of considerable strategic importance and was chosen by Cardinal Albornoz after the abandonment of the old bridge house, the former 14th century fortified residence of Montefeltro which stood nearby.

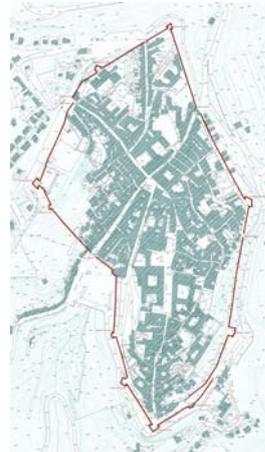


Identification / description of the resources

The walls

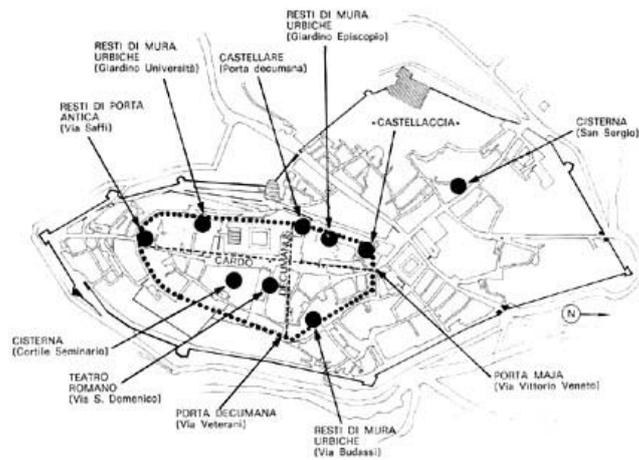


Pianta delle mura di Urbino
Per Giuseppe Rondini, 1834



Pianta attuale delle mura

- BALOARDI (Torriioni)
1. di S. Polo
 2. di S. Agostino
 3. di S. Caterina
 4. della Scuderia Ducale (Tordinone)
 5. del Fortino
 6. Fortezza Albormoz
 7. del Pian del Monte
 8. della SS. Trinità
 9. di S. Lucia
 10. di Porta Lavagine
 11. di S. Eartolo
 12. di S. Chiara
 13. di S. Girolamo
 14. di Belisario



It is not possible to rely on any information regarding the first inhabitants on Urbino territory, even if Plinio il Vecchio, Marrone and Procopio of Cesarea in their writings state that the origins of Urbino are extremely ancient. We know for sure that the Senone Gauls occupied the territory and subjugated the Celts in the 3rd century BC and around 285 BC the Romans took over. The Romanisation of Urbino commenced on this date (Urvinum Metaurense). Procopio, a historian of the 6th century wrote: “Urbino is situated on a reasonably high round hill, not craggy however or impassable.....access is only difficult due to it being steep; there is however access on the flat from the North...” (translation by Camporetti, 1969).

On the basis of the few archaeological finds and evidence provided by B. Baldi, it is possible to assume an outline of a Roman wall, with the indication of the *cardo maximus* and the *decumanus maximus* of the small built-up area dating back to the 2nd century BC. (Prof. Mario Luni, 1977). The boundary wall stretched out starting from the current Via Puccinotti and precisely from the external wall of the house of Laura Battiferri, where an ancient leaf-sculptured arch stands – the ancient Porta Maia; then it continues to the right, towards the bishop’s palace, where the ruins of the old Roman walls are easily visible in the vegetable garden, and proceeds in this direction until reaching the present day Via Saffi, where the pillar of the minor door in the Brandani building wall can be seen, and other ruins which are most likely from the ancient walls in the foundations of San Paolo Church. From the opposite side traces of the wall are less evident, however from the foundations of S. Paolo Church the ancient walls proceed above Via S. Girolamo, and under the S. Chiara monastery, along the garden of the old court, until reaching the Passionei building, continuing above Via Budassi then finishing at Porta Maia. The old boundary wall remained unchanged for several centuries.

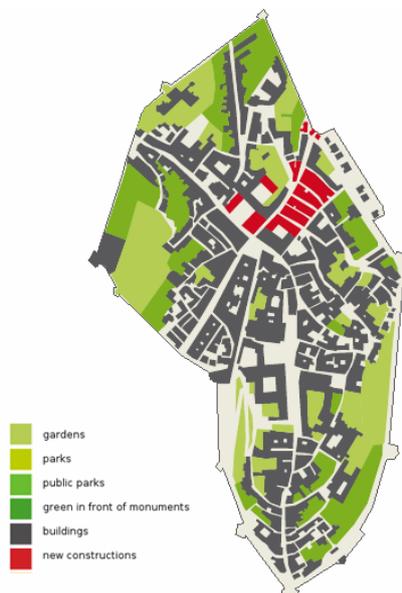
The *Cardo Maximus* crossing the ridge of the hillock terminated to the South with Porta S. Paolo (junction with Via Saffi, Via S. Gerolamo and Via Piave), to the North (approximately at the corner between Via Vittorio Veneto and Via Nazario Sauro). The *Decumanus Maximus*, almost certainly occupied the outline of the present day Via Veterani (Porta Posterla) then terminated next to the castle territory, between the Duomo and Palazzo Ducale (Porta Nuova).

As a result the inhabited centre was split into four parts: the first square, between Porta Maja and Porta Nuova, was that of the diocese; the second was between Porta Nuova and Porta S. Paolo – *Quadra di Porta Nuova*; the third, called *Quadra di S. Croce*, extended from Porta di S. Paolo to Porta Posterla; the fourth, *Quadra di Posterla*, extended from Porta Posterla to Porta Maja. Urvinum metaurense, Roman municipality since 46 BC, continues to develop with the passing of the centuries beyond the walled ring (*burgi extra - moenia*).



Identification / description of the resources

The walled city - Green spaces



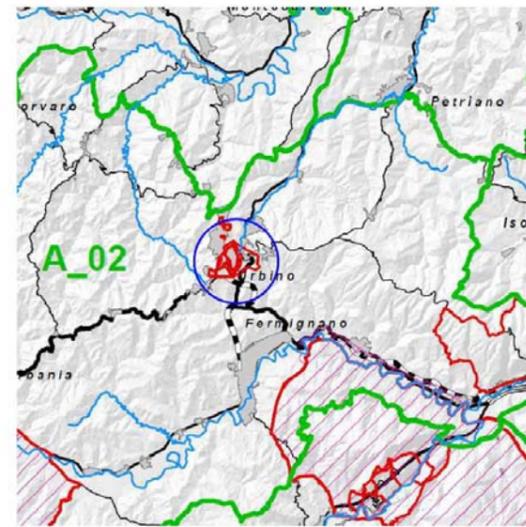
Albornoz fortress is located on the top of the hill, 'the Mount', which stands opposite Palazzo Ducale. Its elevated position free from visual barriers lets it enjoy striking, sweeping views over the town and its environs.

The large area in front, which was once used as a vegetable garden by the Barefoot Carmelites, is now open to the public and dedicated to resistance. The botanical gardens, which are the grounds of Urbino University's Faculty of Natural (Pharmaceutical), Chemical and Physical Sciences, are home to approximately 2300 Italian and foreign plants, some of which require protection in winter. Constructed by Giovanni Brignoli in 1808, the Botanical Gardens are split into three terraces.

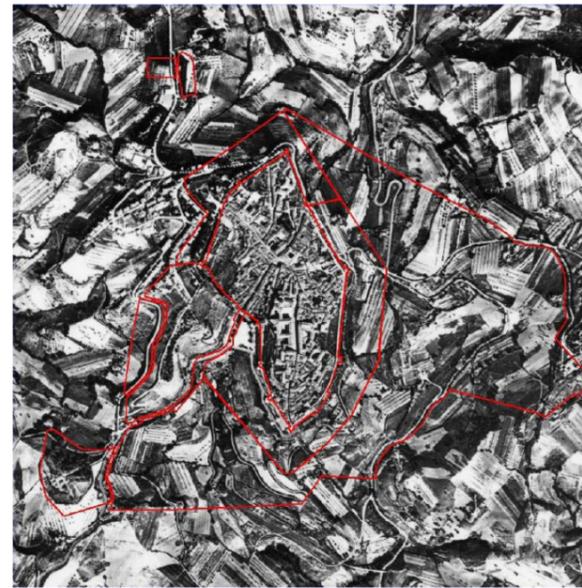
The arrangement of Pincio up to the toll barrier (Via Matteotti) falls within the urban design proposed by Vincenzo Ghinelli in 1840, which supplemented however the design created by Corboli (1826-1827). Since time immemorial, that which subsequently became the Pincio was a steep meadow, a green, maybe neglected, blemish known as 'Dicafante', onto which the ancient Montefeltro building and then the west wing of Palazzo Ducale faced.



Identification / description of the resources - STRUCTURAL INTEGRITY



Comune di Urbino (PU)
Centro Storico
D.M. 27/06/69 - G.U. n. 181 del 18/07/69



1955



1988



2006

The basic idea upon which the existing General City Plan was developed was that of limiting growth of the town behind the historical centre, which started in the '60s, with districts such as Piantata, Mazzaferro, and Giro dei Debitori, and surrounding the historical centre with green areas, more specifically with areas marked out as a Science and Technology Park, in direct relation to the entire park system throughout the area. The environment and landscape were therefore taken as key elements in designing new land plans; the intention has been to interpret the landscape not as a simple summation of structural elements (ridges, water courses, woods etc.), but rather as a structural whole, in which the variations intertwine and combine to generate the Urbino landscape, through centuries-old stratification. Comparison between current and past maps illustrates how the structural integrity of the walled town has remained unchanged.



Plan of Urbino - 1871



Plan of Urbino - 1874



Land registry - 1871



Current Land registry

Identification/description of the resources - VISUAL INTEGRITY	Subdivision of land in Areas
	<p>AREA 1 the walled city views from the walled city landmarks of the walled city from the city to the landscape</p> <p>AREA 2 outside the walled city</p> <p>AREA 3 outside the walled city</p> <p>AREA 4 towards the industrial estate</p> <p>AREA 5 towards the industrial estate</p> <p>AREA 6 area of Maciolla</p> <p>AREA 7 area of Maciolla</p> <p>AREA 8 area of university colleges</p>

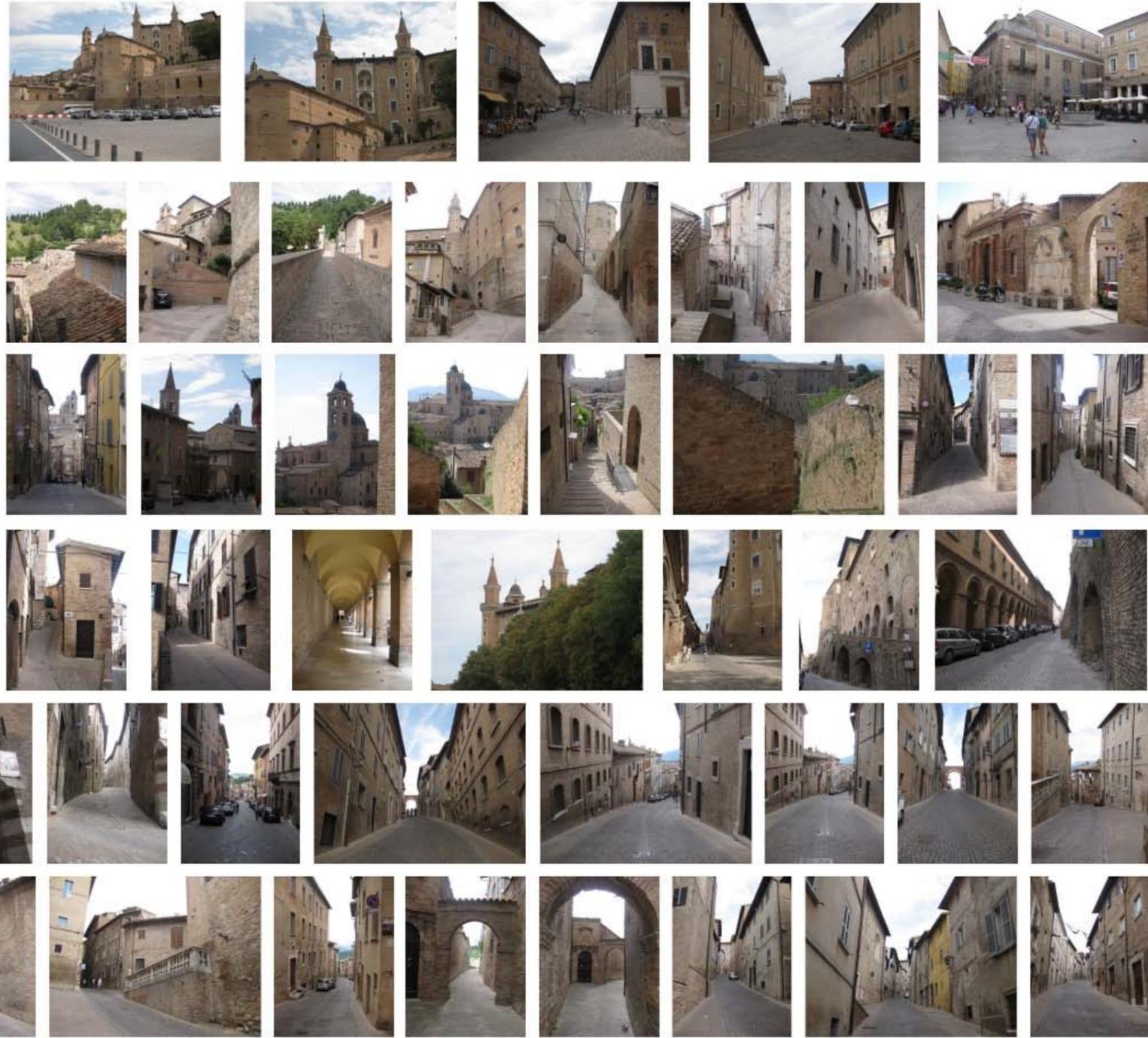
HISTORIC CITY OF URBINO - VISUAL INTEGRITY

from town to landscape



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

the walled town



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

from the walls



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

LANDMARKS



FORTRESS



MERCATALE

Duca Federico's place



Place of Republic



The Renaissance Place



Federico da Montefeltro's Palace



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

2



Details



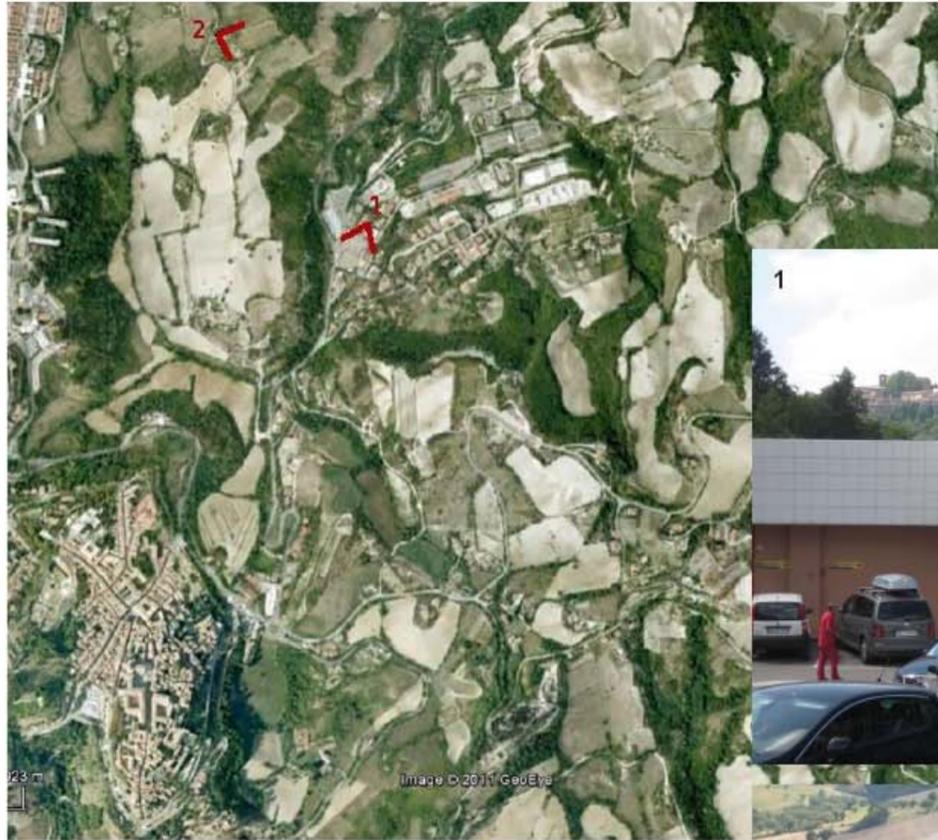
HISTORIC CITY OF URBINO - VISUAL INTEGRITY

3



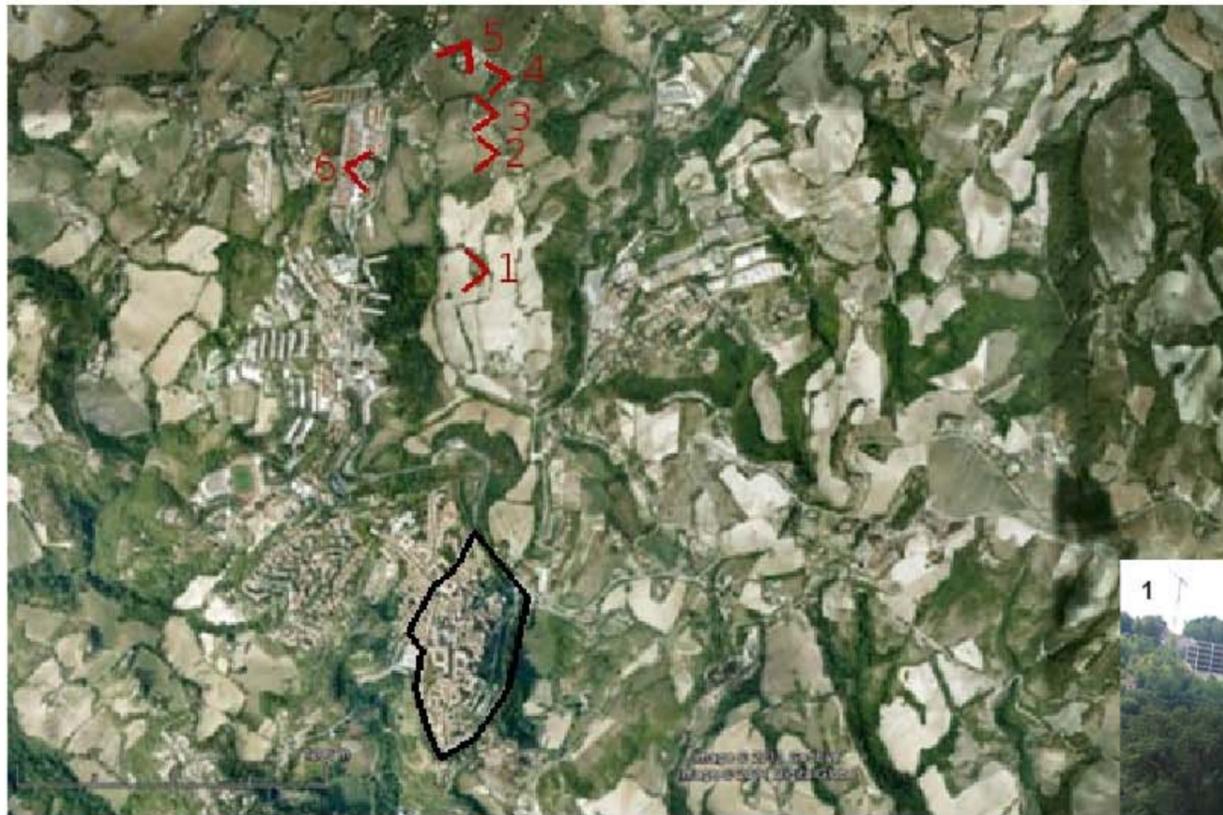
HISTORIC CITY OF URBINO - VISUAL INTEGRITY

4



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

5



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

6



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

7



HISTORIC CITY OF URBINO - VISUAL INTEGRITY

OUTSIDE THE CITY



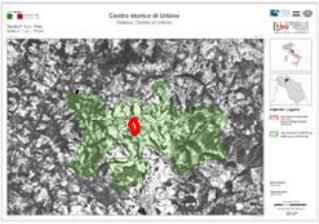
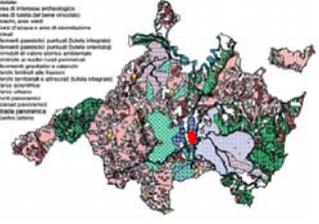
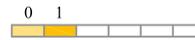
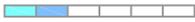
VISUAL INTEGRITY MAP



Already compromised areas from the visual point of view



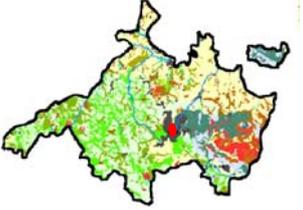
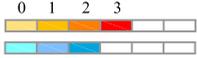
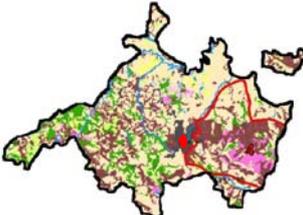
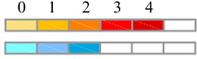
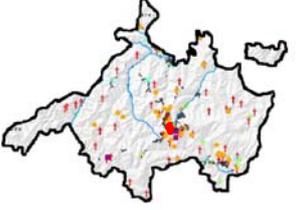
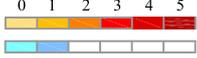
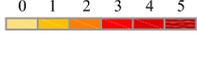
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A1	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A1 is included in the "Core zone" of the WHL</p> <p style="text-align: right;">  </p>
	<p>PROTECTED AREAS</p> <p>The Area A1 is included in the following protected areas: Landscape bond by Italian D.Lgs. 42/2004 (entirely)</p> <p style="text-align: right;">  </p>
	<p>SIC-ZPS</p> <p>The Area A1 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> <p style="text-align: right;">  </p>
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">   </p>
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: very high Possibility for change: no change</p> <p style="text-align: right;">   </p>

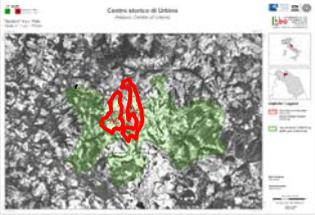
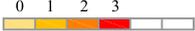
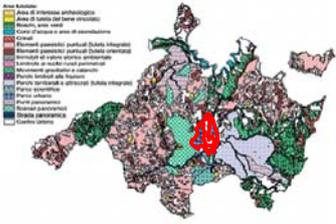
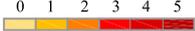
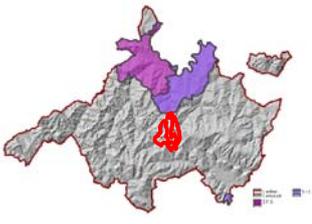
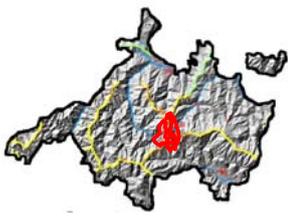
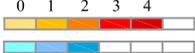
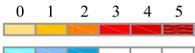
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

AREA A1	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: very high Possibility for change: no change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: no change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A1 is intact from the visual point of view and it represents the symbol of the Renaissance town from the Federico da Montefeltro time until today.</p> 

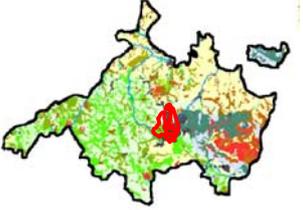
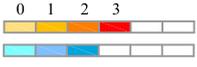
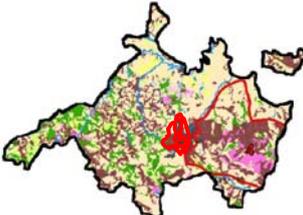
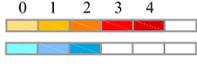
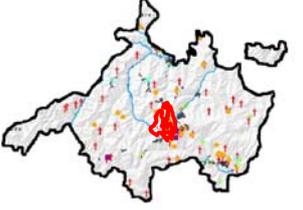
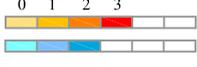
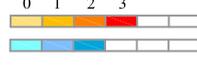
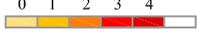
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AREA A2	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A2 is included on the "Buffer zone" of the WHL (entirely).</p> 
	<p>PROTECTED AREAS</p> <p>The Area A2 is included in the following protected areas:</p> <p>Landscape bond by Italian D.Lgs. 42/2004 (partly) Urban Park (entirely)</p> 
	<p>SIC-ZPS</p> <p>The Area A2 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> 
	<p>HIDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> 

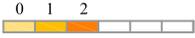
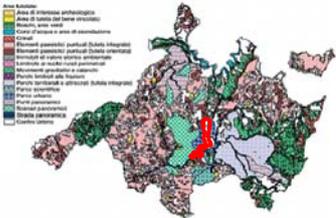
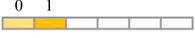
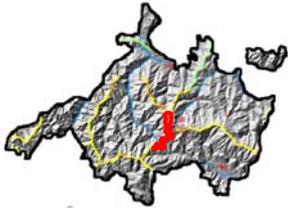
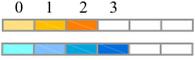
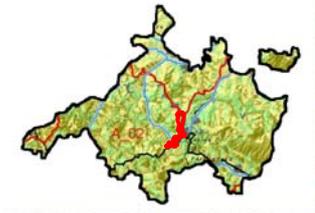
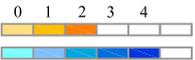
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

AREA A2	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: medium Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A2 is partially intact from the visual point of view and it represents the area in which Urbino can see from different point of views.</p> 

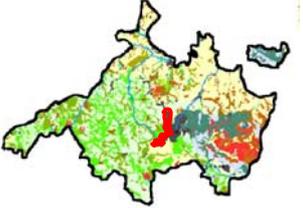
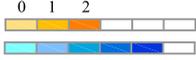
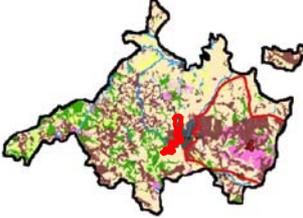
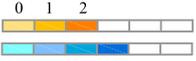
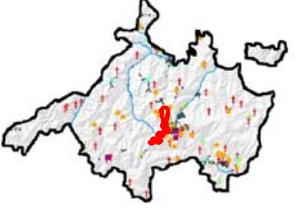
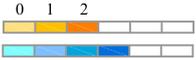
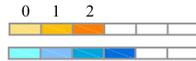
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A3	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A3 is included partly on the "Buffer zone" of the WHL</p> <p style="text-align: right;">  </p>
	<p>PROTECTED AREAS</p> <p>The Area A3 is included in the following protected areas: Landscape bond by Italian D.Lgs. 42/2004 (partly)</p> <p style="text-align: right;">  </p>
	<p>SIC-ZPS</p> <p>The Area A3 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> <p style="text-align: right;">  </p>
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: low Possibility for change: minor change</p> <p style="text-align: right;">  </p>
	<p>LANDSCAPE RESOURCES</p> <p>The landscape behind the walled city was heavily affected by the modern urbanization, so it has lost some of its original connotative characters.</p> <p>Importance of the resource: low Possibility for change: moderate change</p> <p style="text-align: right;">  </p>

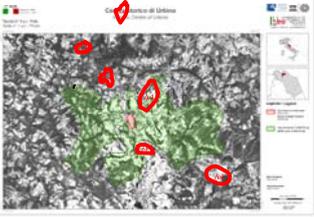
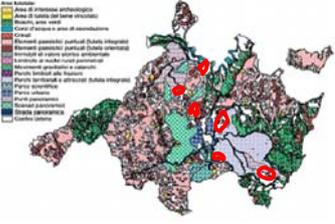
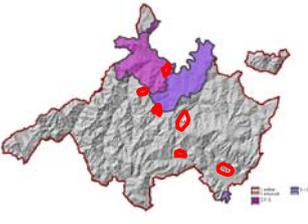
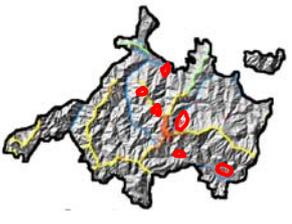
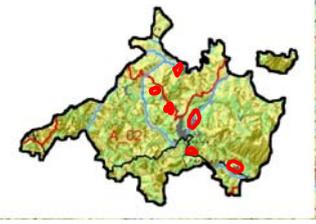
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

AREA A3	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: low Possibility for change: moderate change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: low Possibility for change: medium change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: medium change</p> 
	<p>LAND USE</p> <p>Importance of the resource: low Possibility for change: medium change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A3 is not intact from the visual point of view.</p> 

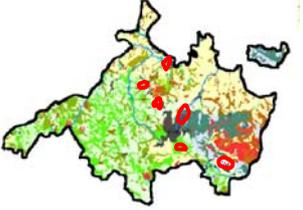
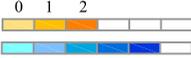
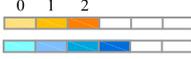
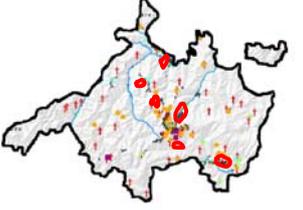
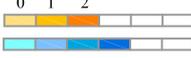
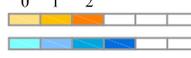
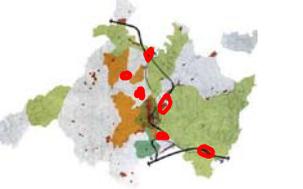
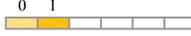
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A4	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A4 is included partly on the "Buffer zone" of the WHL</p> <p style="text-align: right;">  </p>
	<p>PROTECTED AREAS</p> <p>The Areas A4 are not included in the protected areas</p> <p style="text-align: right;">  </p>
	<p>SIC-ZPS</p> <p>The Area A4 is partially included in the SIC-ZPS Areas (Schieti)</p> <p>Importance of the resource: medium</p> <p style="text-align: right;">  </p>
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: low Possibility for change: minor change</p> <p style="text-align: right;">  </p>
	<p>LANDSCAPE RESOURCES</p> <p>The wider urbanization has altered the original character of the landscape.</p> <p>Importance of the resource: low Possibility for change: moderate change</p> <p style="text-align: right;">  </p>

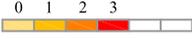
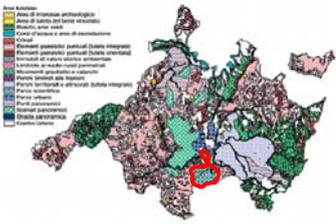
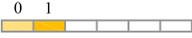
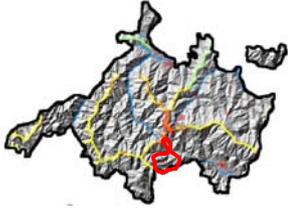
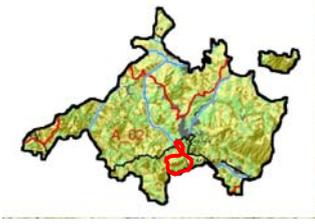
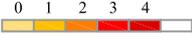
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

AREA A4	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: low Possibility for change: moderate change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: low Possibility for change: minor change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: minor change</p> 
	<p>LAND USE</p> <p>Importance of the resource: low Possibility for change: minor change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Areas A4 are not intact from the visual point of view.</p> 

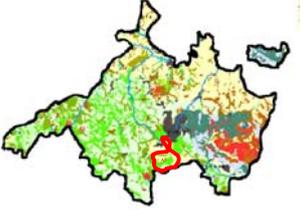
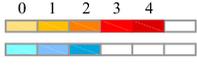
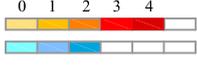
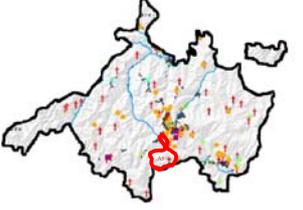
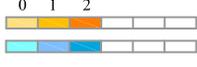
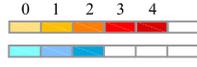
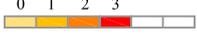
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A5	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A5 is included on the "Buffer zone" of the WHL (entirely)</p> 
	<p>PROTECTED AREAS</p> <p>The Areas A5 area included in the following protected areas: Scientific Park (entirely)</p> 
	<p>SIC-ZPS</p> <p>The Area A5 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> 
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: low Possibility for change: negligible change</p>  
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p>  

Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

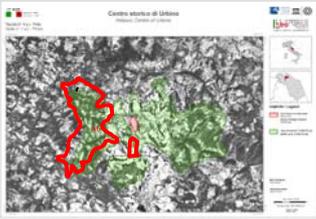
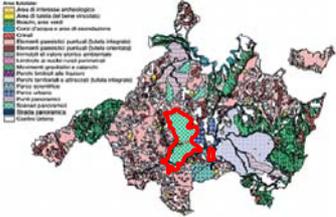
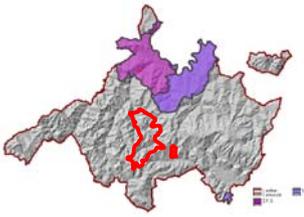
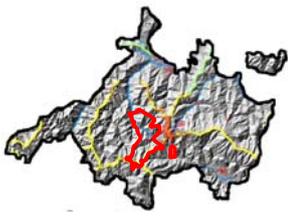
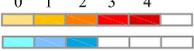
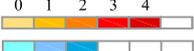
Definition of the intensity and possibility of change of resources.

AREA A5	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A5 is partially intact from the visual point of view.</p> 

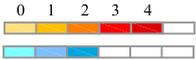
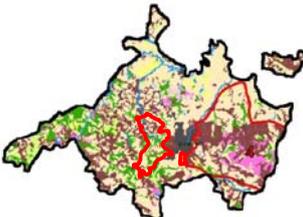
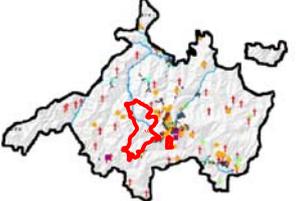
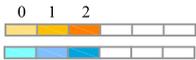
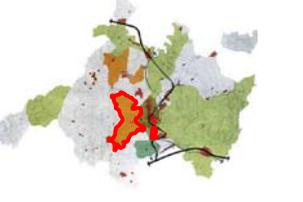
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

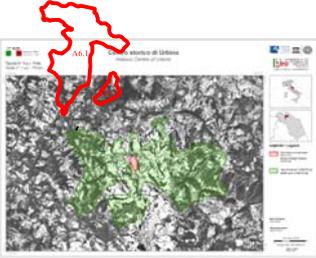
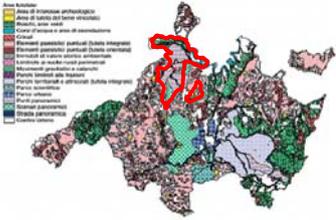
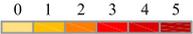
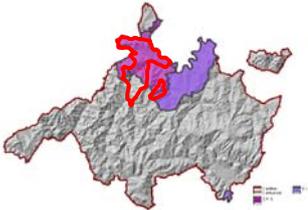
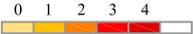
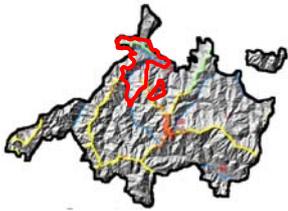
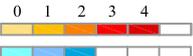
Definition of the intensity and possibility of change of resources.

AREA A6	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A6 is included on the "Buffer zone" of the WHL (entirely)</p> <p style="text-align: right;">0 1 2 3</p> 
	<p>PROTECTED AREAS</p> <p>The Areas A6 are included in the following protected areas: Panoramic views (entirely)</p> <p style="text-align: right;">0 1 2 3 4 5</p> 
	<p>SIC-ZPS</p> <p>The Area A6 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> <p style="text-align: right;">0 1</p> 
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2 3 4</p> 
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2 3 4</p> 

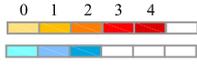
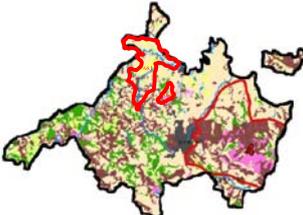
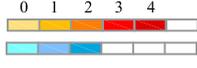
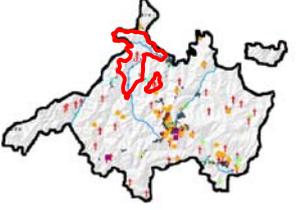
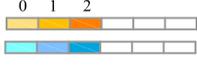
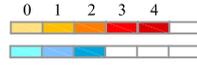
Methodological approach to the conservation of HUL: the case of Urbino
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AREA A6	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A6 is partially intact from the visual point of view</p> 

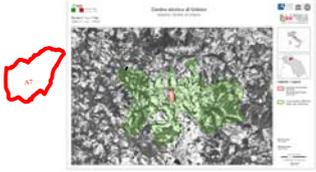
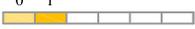
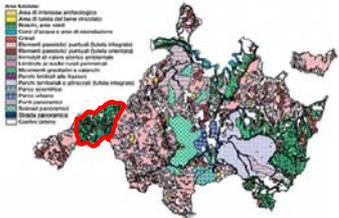
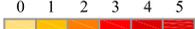
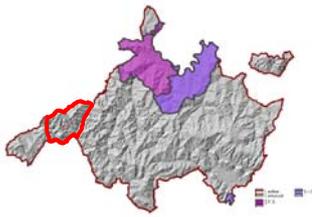
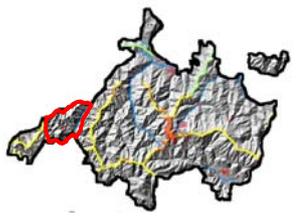
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A6.1	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A6.1 is not included on the WHL</p> 
	<p>PROTECTED AREAS</p> <p>The Area A6.1 is included in the following protected areas: Panoramic views (entirely)</p> 
	<p>SIC-ZPS</p> <p>The Area A6.1 is almost entirely included in the SIC-ZPS Areas</p> <p>Importance of the resource: high</p> 
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 

Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A6.1	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A6.1 is partially intact from the visual pint of view</p> 

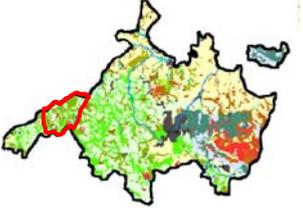
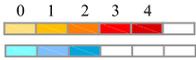
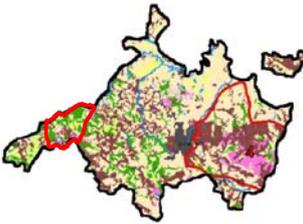
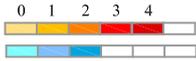
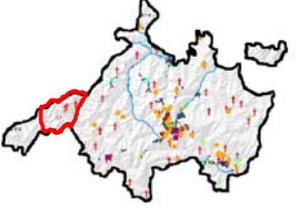
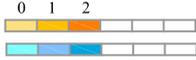
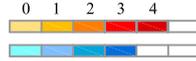
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A7	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A7 is not included on the WHL</p> <p style="text-align: right;">0 1 </p>
	<p>PROTECTED AREAS</p> <p>The Area A7 is included in the following protected areas: Green areas (entirely)</p> <p style="text-align: right;">0 1 2 3 4 5 </p>
	<p>SIC-ZPS</p> <p>The Area A7 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> <p style="text-align: right;">0 1 </p>
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2 3 4  </p>
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2 3 4  </p>

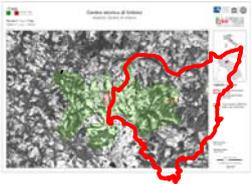
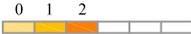
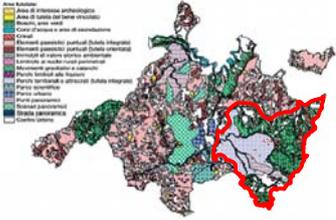
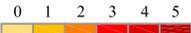
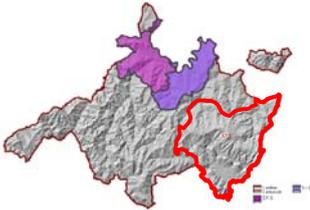
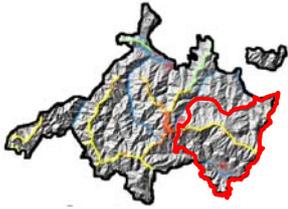
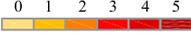
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

AREA A7	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: minor change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A7 is partially intact from the visual point of view.</p> 

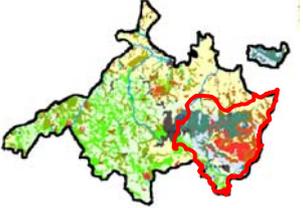
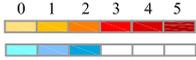
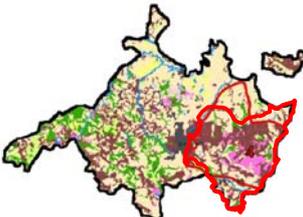
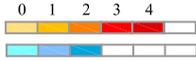
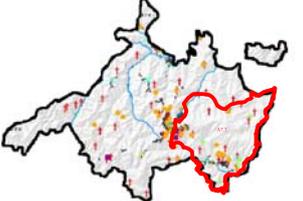
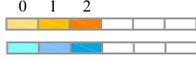
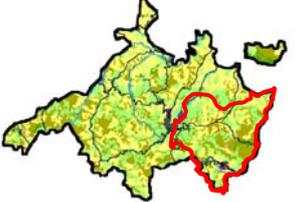
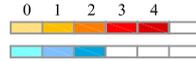
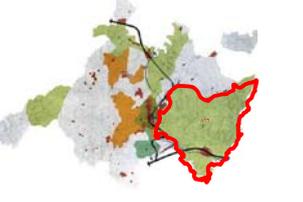
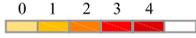
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A7.1	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A7.1 is included on the Buffer zone (partially)</p> 
	<p>PROTECTED AREAS</p> <p>The Area A7.1 is included in the following protected areas:</p> <p>Parco delle Cesane (partially) Full protection</p> 
	<p>SIC-ZPS</p> <p>The Area A7.1 is not included in the SIC-ZPS Areas</p> <p>Importance of the resource: negligible</p> 
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> 

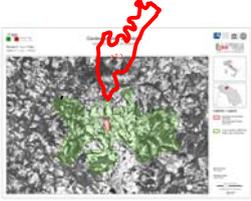
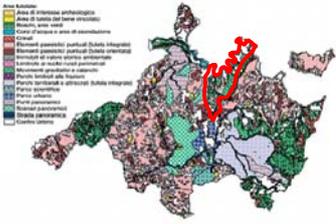
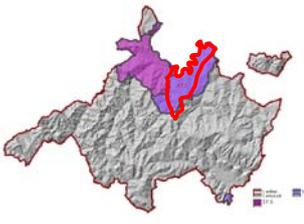
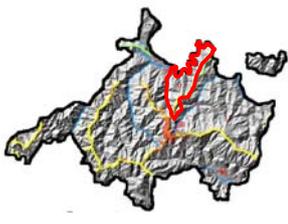
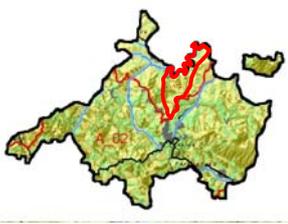
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

Definition of the intensity and possibility of change of resources.

AREA A7.1	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A7.1 is partially intact from the visual point of view</p> 

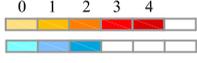
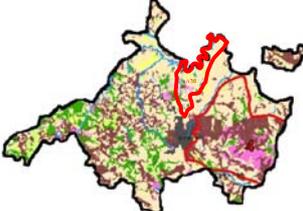
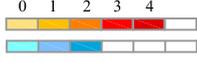
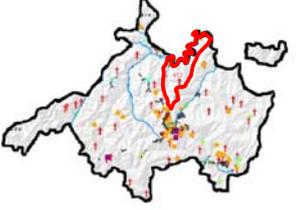
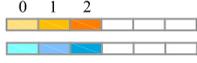
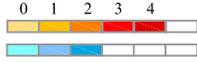
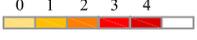
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A7.2	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A7.2 is not included on the WHL</p> <p style="text-align: right;">0 1 </p>
	<p>PROTECTED AREAS</p> <p>The Area A7.2 is included in the following protected areas:</p> <p>Green areas</p> <p style="text-align: right;">0 1 2 3 4 </p>
	<p>SIC-ZPS</p> <p>The Area A7.2 is wholly included in the SIC-ZPS Areas</p> <p>Importance of the resource: very high</p> <p style="text-align: right;">0 1 2 3 4 5 </p>
	<p>IDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2 3 4 </p>
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: very high Possibility for change: negligible change</p> <p style="text-align: right;">0 1 2 3 4 5 </p>

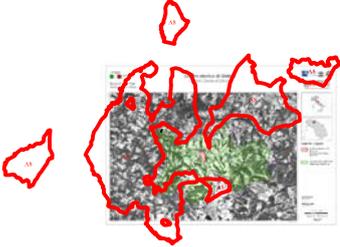
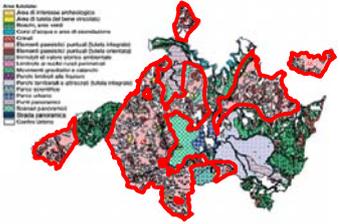
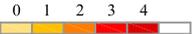
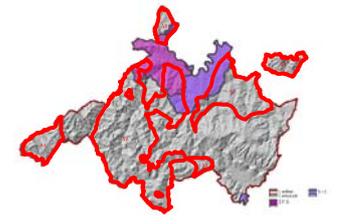
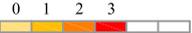
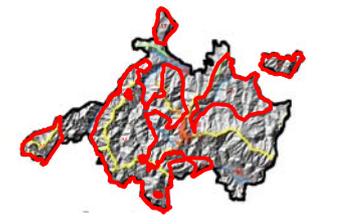
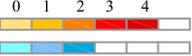
Methodological approach to the conservation of HUL: the case of Urbino

Division of the territory into macro-areas.

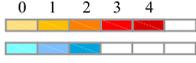
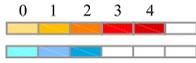
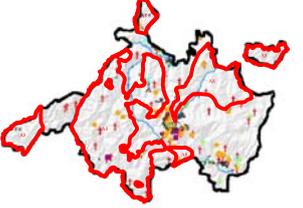
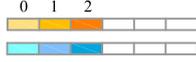
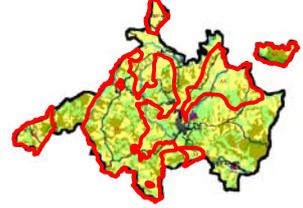
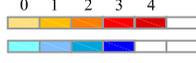
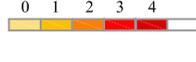
Definition of the intensity and possibility of change of resources.

AREA A7.2	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A7.2 is partially intact from the visual point of view</p> 

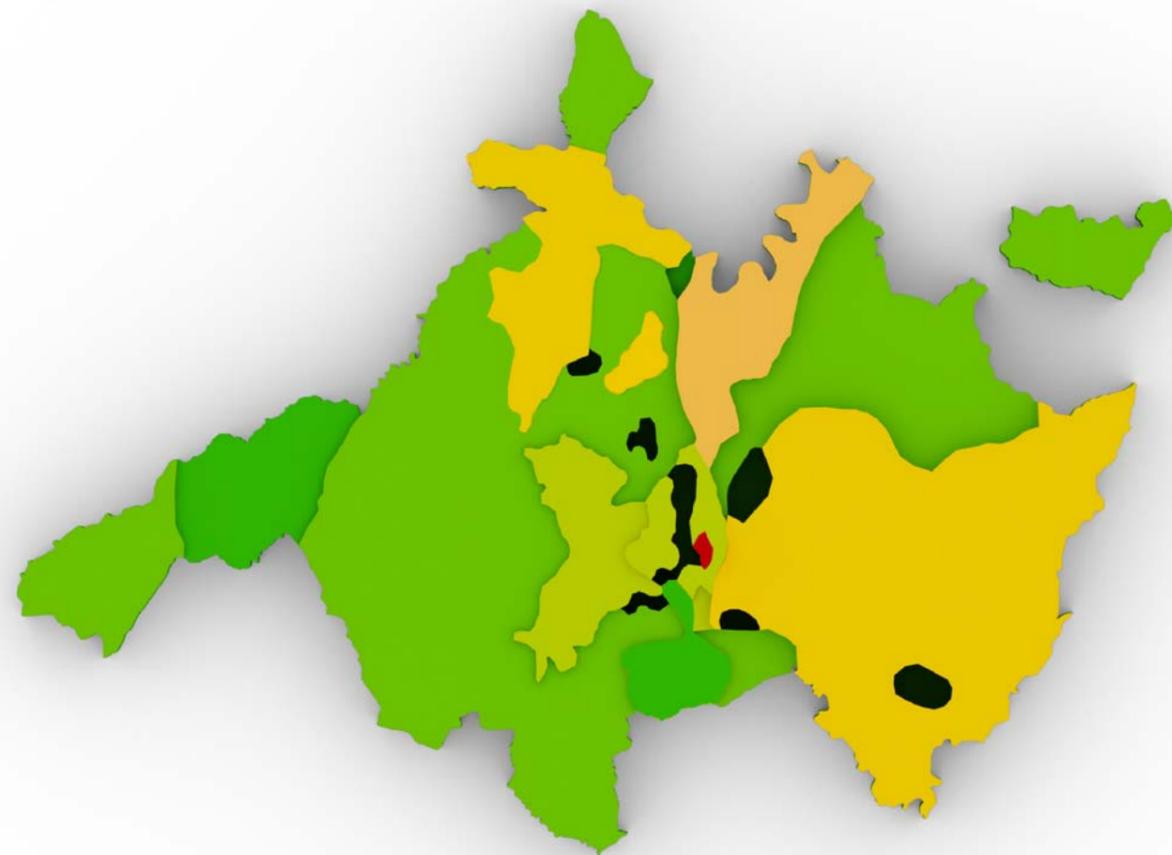
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A8	IMPORTANCE OF THE RESOURCES
	<p>WORLD HERITAGE LIST</p> <p>The Area A8 is not included on the WHL</p> 
	<p>PROTECTED AREAS</p> <p>The Area A8 is included in the following protected areas: Full protection</p> 
	<p>SIC-ZPS</p> <p>The Area A8 is partially included on the SIC-ZPS Areas</p> <p>Importance of the resource: medium</p> 
	<p>HYDROLOGICAL SYSTEM</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>LANDSCAPE RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 

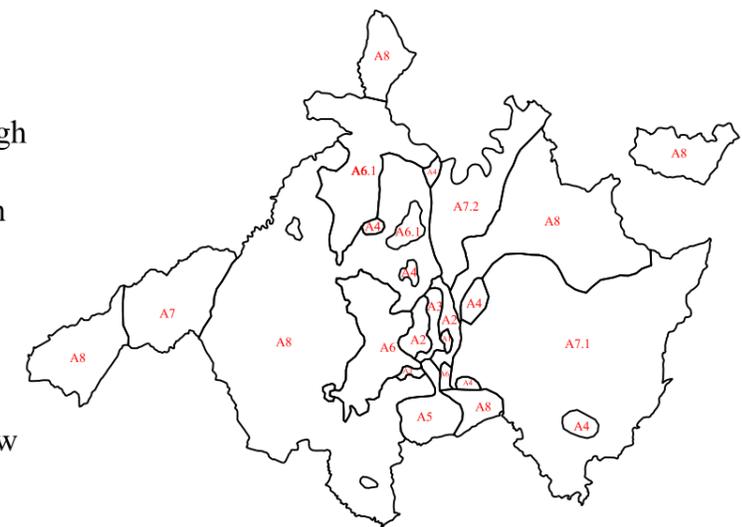
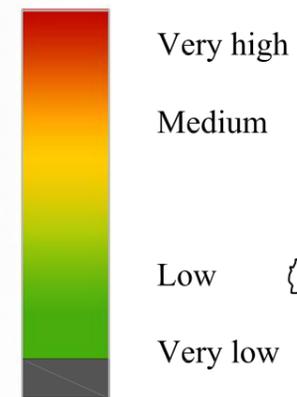
Methodological approach to the conservation of HUL: the case of Urbino
Division of the territory into macro-areas.
Definition of the intensity and possibility of change of resources.

AREA A8	IMPORTANCE OF THE RESOURCES
	<p>ECOSYSTEMS</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>BOTANICAL/VEGETATION RESOURCES</p> <p>Importance of the resource: high Possibility for change: negligible change</p> 
	<p>HISTORICAL-CULTURAL RESOURCES</p> <p>Importance of the resource: low Possibility for change: negligible change</p> 
	<p>LAND USE</p> <p>Importance of the resource: high Possibility for change: moderate change</p> 
	<p>VISUAL INTEGRITY</p> <p>The Area A8 is partially intact from the visual point of view</p> 

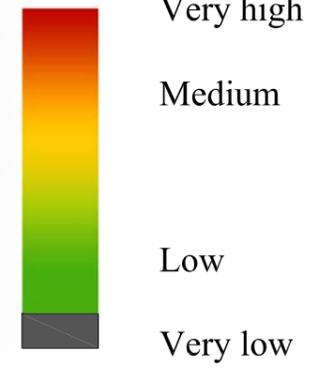
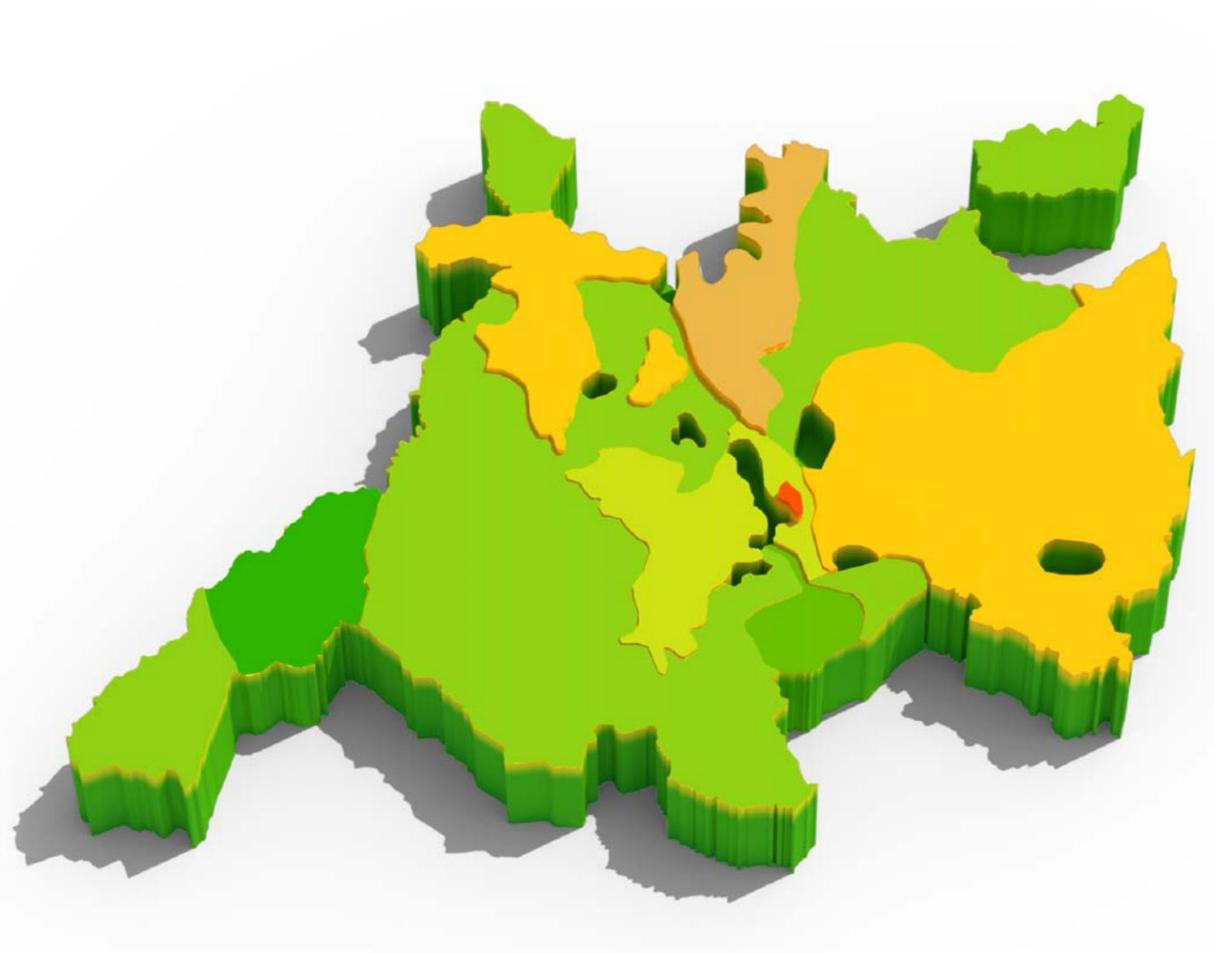
INTENSITY MAP



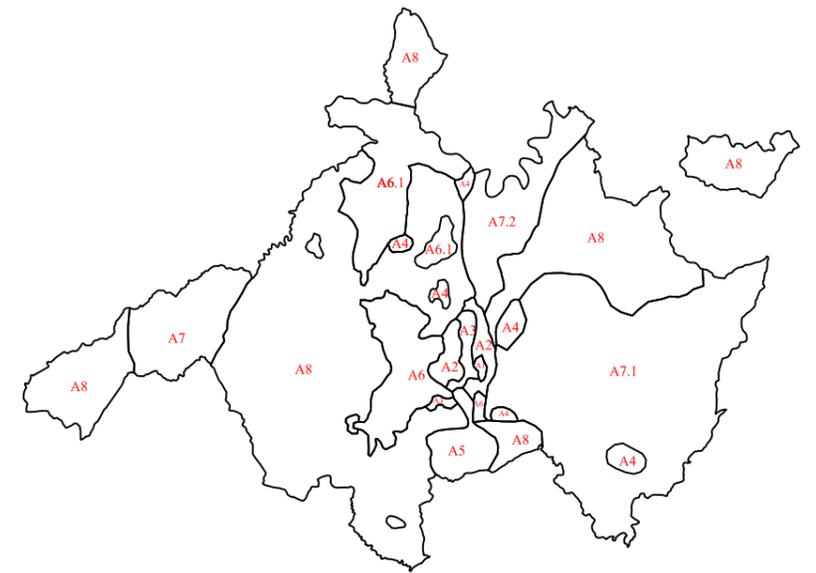
IMPORTANCE OF THE RESOURCES



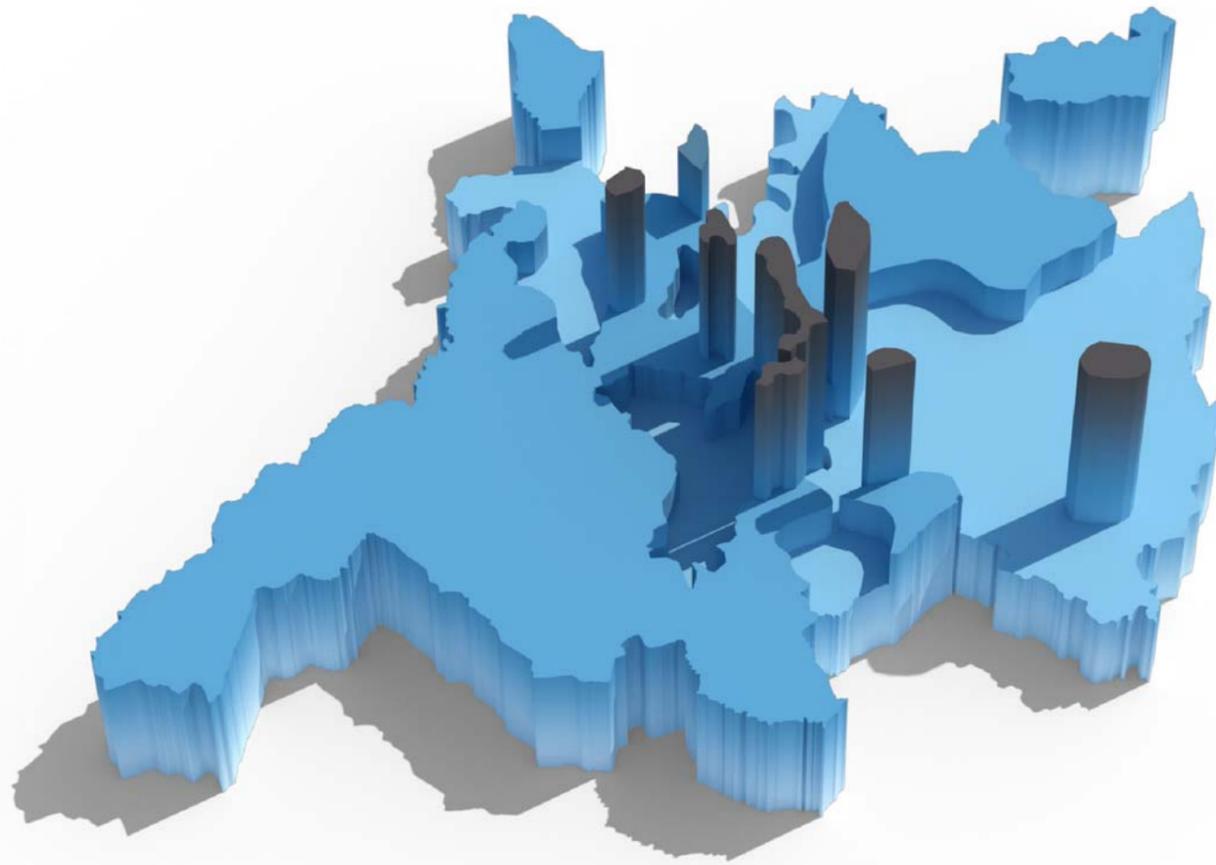
INTENSITY MODEL



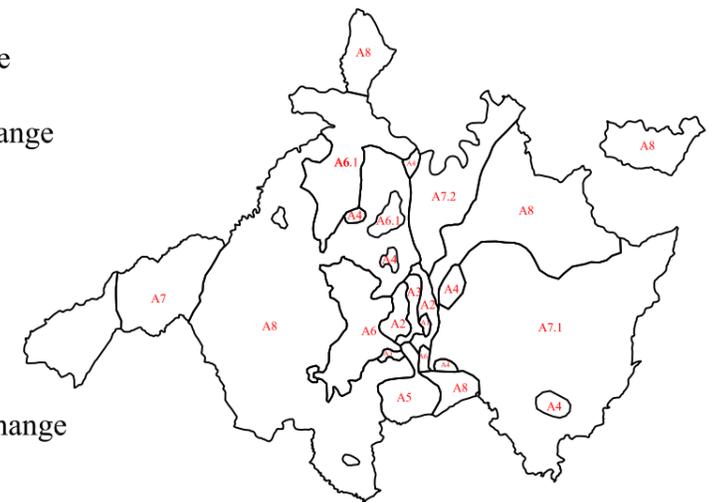
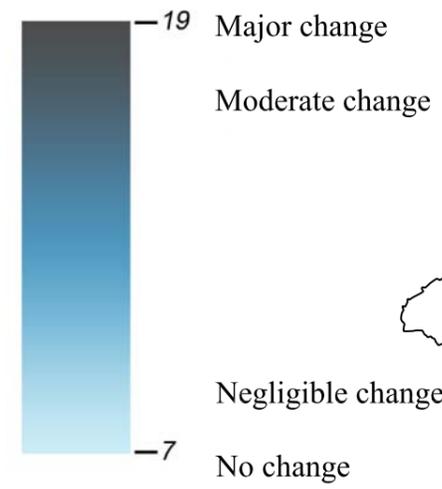
IMPORTANCE OF THE RESOURCES



VULNERABILITY MODEL



VULNERABILITY/POSSIBILITY FOR CHANGE



18.3. GENERAL GUIDELINES FOR THE CONSERVATION AND DEVELOPMENT OF THE HUL: THE CASE OF ASSISI

18.3.1. General considerations

The general picture described previously in relation to Urbino suggests some general considerations regarding the future development possibilities for this historic urban landscape.

To this effect, it would seem necessary to *outline a new idea of town*, and look beyond the development model that has been adopted up until now, retrieving the best of what it still has to offer, but overcoming the critical issues on the basis of a new concept of the relationship between the town, hamlets and territory.

First and foremost, substantial upgrading of the economic structure is required, together with the implementation of a series of updated planning and support policies that develop the town's economy in medium timescales.

The "university monoculture" is now limiting the development of new dynamics, and alternatives should be identified as a matter of urgency, in accordance with the natural and historical features of Urbino and its wider area. The idea would be to steer the growth of the town towards a widespread, environmentally friendly territorial development model.

To this effect, the development of quality organic farming should be considered as strategic and be supported with considerable investment.

Even the handcrafts sector, which has been undervalued and in difficulty for some time now, should be updated and modernised, combining new tools with skills and techniques handed down through the generations, specialising in high quality limited production with a high level of added value.

The combined development of handcrafts and quality farming could have a considerable impact in terms of attracting residential tourism which is mindful of culture and the environment.

By doing so the basis for the construction of a vast socio-economic district would be established, centred on the exchange of roles between the various social situations and work activities.

An ambitious idea of new development would be outlined, based on the continuous overlapping of knowledge, social equality and cultural innovation.

However, this differentiation of economic structure would be useless without parallel action that concerns the University directly and its relationship with the town.

The centre has to be gradually repopulated, at least partially, by a stable residential sector, and Urbino has to go back to housing new and old Urbino citizens.

They have to be attracted by providing the town with services that make it inhabitable for residents, through a new housing policy - for example by providing incentives in relation to rents for families and not just students.

With regard to the quality of life, service provision is required in addition to the undertaking of responsibilities by users.

Therefore in terms of economics, logistics and tools, we should favour those forms of self-organisation and self-management that make not just students, but also the young of Urbino, and all its citizens in general, active, innovative participants in the life of the town.

The identification of areas where associations can be formed, for example, where everybody can meet up in other situations and participate in debates, film clubs, concerts, and exhibitions, would be a move in this direction.

These ideas outline various development strategies by 'subject'.

Therefore it would be appropriate to:

1. Outline a strategy for the future of Urbino and its territory, aimed at overcoming the current economic situation and mapping out new lines of development, capitalising on existing resources and functions, but also identifying further potential in the town and its new autonomous roles, possibly complementary to those established by the university town and world of art;

2. Capitalise on Urbino's, and the surrounding territory's, specific cultural and environmental characteristics, making the isolation, way of life, landscape which remains intact, great cultural tradition, farming and food resources and excellent companies, strengths rather than weaknesses.

Urbino has to be recognised as a unique, sought-after place, where ways of life that are disappearing can still be found, in addition to workshops to build a different development model, the increasing need for which is felt all over the world;

3. Bring balance back to the relationship between the University and the town. The overriding importance of these cultural establishments on employment and

economy, and the size of the student population compared with the resident population in Urbino, create problems not only for the town, which depends on one activity excessively, but also for educational establishments, which require a thriving independent social and cultural framework to develop their potential fully.

4. Build a new relationship with the territory surrounding Urbino, strengthening and diversifying service and business activities in the chief town and creating a more solid network of relationships between the various centres of Alto and Medio Metauro and Montefeltro.

5. Use the evolving Strategic Plan not just as a reference framework of specific social and economic policies, but also as an important tool to verify requirements and opportunities in relation to variations of the existing PRG, and as a benchmark for the site Management Plan. To this effect, the formulation of the UNESCO site Management Plan should be incorporated into the Strategic Plan, becoming an important element. The inclusion of the Management Plan in the Strategic Plan will also constitute an element that ensures the implementation of initiatives, and monitoring of the conservation process and the results obtained.

18.4. CITY DEVELOPMENT STRATEGY (CDS)/ CITY CONSERVATION STRATEGY (CCS)

In terms of urban development, we have seen how the historic centre, and the whole Urbino territory in general, is subject to strict protective legislation. Further building development would be undesirable in these areas, to avoid compromising the integrity and original character of the historic urban landscape.

The 1994 PRG stifled development in the hamlets with intensive building surrounding Urbino, especially in the area behind the historic centre and in the area of Casino Noci, where the sustainable development of these areas could now be considered, even by intervening on existing developments by upgrading them, in addition to creating new social and economic development opportunities for the town.

To this effect the City Development Strategy (CDS)/City Conservation Strategy (CCS) identifies the macro areas of expansion in the historic centre and the areas where maximum conservation is necessary, such as:

- **areas which are strictly off-limits:** these are the areas in the historic centre and almost all municipal territory, which are already subject to strict protective legislation;

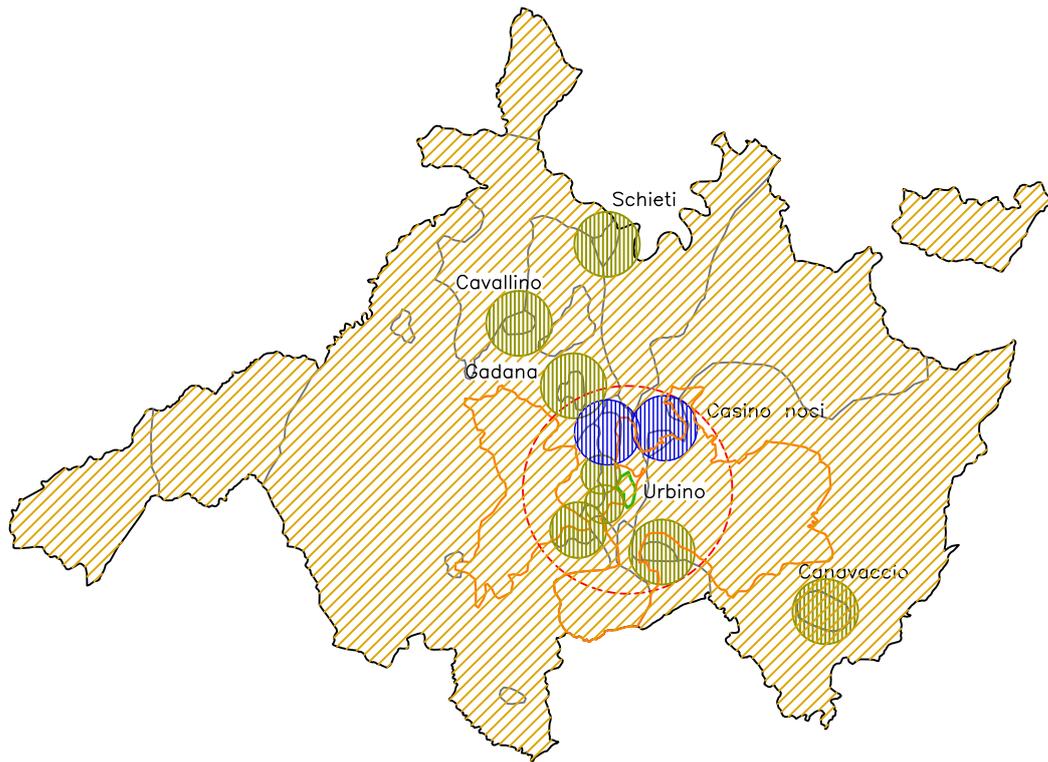
- **development opportunities, especially for the construction of high buildings:** these are the areas north of the historic centre, where building expansion, started with Giancarlo De Carlo's PRG, is still in progress. In particular, as illustrated in the photographs, it can be noted that the area beyond Porta S.Lucia is involved in work that will change a part of the town and the dynamics of its socio-economic operation significantly.

- **already compromised areas that require careful planning, design and implementation:** these are the hamlets that have partially been compromised by recent building work, which should be subject to practical, organised planning aimed at rearranging the territory.

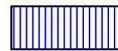
In the case of this town, there is the lack of the Management Plan and the General Plan of the city was elaborated in 1994.

The CDS/CCS related to the conservation of HUL should be integrated into the future Urbino planning tools in relation to put more attention to the environmentally sustainable management and controlled development of areas forming the context/setting for the significant historic centre of the city, which are not sufficiently protected, in line with what is contained in the Recommendation on HUL .

PLAN of city development strategy (CDS)/ city conservation strategy (CCS)



strictly no-go areas



opportunities for development, in particular for the construction of high buildings



already compromised areas that require attention to planning, design and implementation



border of the UNESCO Core zone



Buffer zone



19. METHODOLOGICAL APPROACH TO THE CONSERVATION OF HUL: THE CASE OF FERRARA

19.1. Introduction: sources

The study of the historic city of Ferrara took place through the analysis of the relations characterising the city and its territory.

The system of the historic city would here appear to be fragmented. The historic city within the walls is characterised by the partial loss of the original traits of the settlement following the construction of poor quality building in both outlying and central areas.

The system with which Ferrara functions is horizontal and can be summarised as a “system” approach (university, dwellings, business, roads, etc.), which connect it to the rest of the territory.

We can therefore consider a development/conservation of HUL in line with the existing city, working on networks, relations, etc., i.e. seeking to connect what there already is, enhancing and re-ordering it.

Therefore, one possible scenario may consist of the need to work on the existing city, expanding the centre, creating networks and connections and integrating the meaning of the historic centre within the complex system of networks and relations comprising the city.

The methodological approach taken to the study of HUL in the case of Ferrara, which is basically similar to that of the other two cities, has established the study of planning tools of the Municipality of Ferrara and a general look at the general regulatory tools of a further 26 municipalities included in the UNESCO site, which are reunited in adopting shared planning.

The cartography and the reports comprising the PRG of Ferrara are the main source from which the information was taken to prepare the methodological approach to the conservation of the HUL.

The essential cartographic sources have been suitably reprocessed in digital format and subsequently summarised in relation to the need to obtain useful information in order to get to know and optimise the local resources.

Further essential sources for the study of the place and the preparation of the Methodological Approach to the conservation of HUL are the PTCP of the Province

of Ferrara and the Management Plan relative to the UNESCO site “Ferrara, City of the Renaissance and its Po Delta”.

The consultation of the historic cartography preserved at the *Biblioteca Augustea* of Ferrara and the databases in relation to the extended cartography have proved to be essential to the study of the evolution of the city’s urban form.

The research and inspections carried out *in loco*, with specific reference to the photographic campaign organised throughout the municipal territory also completed the analysis stage and proved to be essential in gaining more information on aspects connected above all with functional relations between the different parts of the city and the “systems” with which the city itself functions.

In short, the sources used to prepare the Methodological Approach to the conservation of HUL in the case of Ferrara, were:

- 2009 Ferrara General Plan
- PTC Region of Emilia Romagna
- PTCP Province of Ferrara
- site surveys
- photographic survey
- internet sources
- 2009 *Ferrara, City of the Renaissance and its Po Delta* Management Plan
- General Plan "Unione dei Comuni Terre e Fiumi (Comuni di Copparo, Berra, Formignana, Jolanda di Savoia, Tresigallo and Ro)";
- Associated Municipal Structural Plan of Argenta.Migliarino-Ostellato-Portomaggiore-Voghiera;
- Associated Municipal Structural Plan of Bondeno, Cento, Mirabello, Poggio Renatico, Sant'Agostino, Vigarano Mainarda;
- for the definition of the intensity of resources/possibility for change: 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties.

19.2. THE APPROACH

The methodological approach to the conservation of HUL in the case of Ferrara includes the following points:

1. IDENTIFICATION AND STUDY OF THE GENERAL RESOURCES OF THE AREA

1.1. IDENTIFICATION/DESCRIPTION OF THE RESOURCES:

- types of landscapes
- systems
- natural landscapes
- ecological and green network
- territorial restrictions
- use of agricultural land
- social-economic analyses

1.2. DESCRIPTION OF THE IMPORTANCE OF THE RESOURCES WITHIN THE WHOLE CONTEXT OF THE CITY

Each resource has been described in relation to its importance in the whole context of the city and in relation to its importance with other resources.

1.3. DESCRIPTION OF THE "VULNERABILITY" OF THE RESOURCES

As we have said above, the term "Vulnerability" means a condition of easy alteration or destruction of the characters marking the areas.

In this sense, the areas outside the historic centre or UNESCO perimeter are more vulnerable, as they are often insufficiently protected by town planning tools and it is here that it is appropriate to pay more careful attention to action taken with a view to development and conservation.

In the case of Ferrara, both part of the historic centre within the walls and the urban areas lying outside it have been subject in previous years to urban development that has often been uncontrolled, with the consequent loss of the original characteristics of the city's historic urban fabric.

2. DIVISION OF THE TERRITORY INTO MACRO-AREAS, SIMILAR AS FOR RESOURCES

The territory has been divided up into various macro-areas which have similar characteristics in terms of their morphology, structure, location, etc. and within which similar resources can be seen, as described below:

- Farmhouse landscape
- Reno valley landscape
- Old lands landscape
- Landscape of the natural river environments

Considering the complexity of the territory of Ferrara, each area has, in turn, been divided up into other homogenous areas, identified according to their historical-natural characteristics and on the basis of the restrictions present in the territory (historic centre, monumental and landscape restrictions, ancient river beds, etc.).

For each of these, the “dominant structure” has been identified and analysed in terms of its distinctive, physical-natural, historical-cultural, and social-economic components that cause the identifying character to emerge and enable the identification of the quality objectives to be pursued. In the division of the areas, careful attention has been paid to the protective restriction boundaries already in place (Landscape bonds, Monumental bonds, etc.).

3. DEFINITION OF THE INTENSITY OF RESOURCES IN MACRO AREAS ACCORDING TO WELL-DEFINED STANDARDS OF EVALUATION

(Ref. ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

the intensity of resources in macro areas is defined according to standards of evaluation, as following:

- **IMPORTANCE OF RESOURCES:**

- Very High 5
- High 4
- Medium 3
- Low 2
- Negligible 1
- Unknown 0

area inscribed on the core zone+SIC+Landscape bond	5
area inscribed on the core zone+Monumental Bond+Landscape bond	5
area inscribed on the core zone+Landscape bond	4
area inscribed on the core zone+Monumental bond	4
landscape bond+areas of environmental interest	4
Landscape bond+area inscribed on the buffer zone	3
landscape bond	2
core zone	2
buffer zone	1
area not inscribed	0

4. DRAFT OF AN INTENSITY PLAN IN ORDER TO IDENTIFY THE IMPORTANCE OF RESOURCES AND CONSEQUENTLY AREAS WHERE IT IS POSSIBLE TO CALCULATE THE DEVELOPMENT AND AREAS IN WHICH SAFEGUARD IS NECESSARY

The intensity map uses different colours to define the areas in which resources have a greater weight and, vice versa, those in which resources are more scarce, where intervention is possible, establishing sustainable development.

The colour dark red is used on the intensity map to identify areas in which resources have a "greater weight" (or major intensity) and light green for the areas in which resources have a "minor weight" (or minor intensity).

5. DRAFT ON AN INTENSITY MODEL

It is a 3D model that shows the situation described above.

6. DRAFT OF A VULNERABILITY PLAN

This is a map that, differently to the previous, defines the most vulnerable areas and therefore those most subject to change in relation to the lack or to the inadequacy of protection laws. Light blue has been used to define the areas that have a minor vulnerability and dark blue for the areas that have a major vulnerability.

7. DRAFT ON AN INTENSITY/VULNERABILITY MODEL

It is a 3D model that shows the situation above illustrated.

8. FERRARA BETWEEN "NETWORKS AND RELATIONSHIPS"

- expand the centre: urban axes and centrality;
- Ferrara a city on the net.

9. DRAFT OF A “CITY DEVELOPMENT STRATEGY” (CDS) OR A “CITY CONSERVATION STRATEGY” (CCS) INCLUDING:

- strictly no-go areas;
- requalification of the existing tissue: areas near the historic centre;
- partially intact areas that require careful attention to planning, design and implementation;
- more vulnerable areas that require great attention to planning, design and implementation.

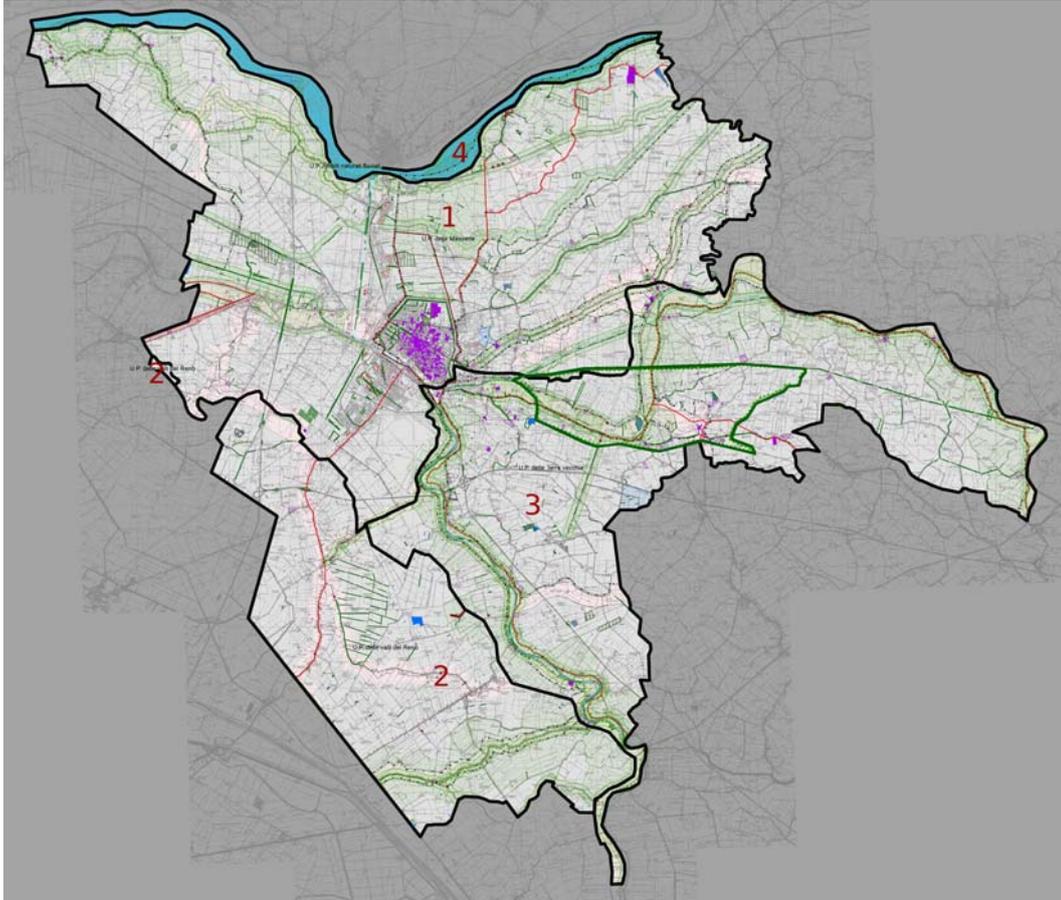
10. DEFINITION OF PRIORITY ACTIONS FOR CONSERVATION/DEVELOPMENT

Drafting of some general guidelines for the conservation and development of the historic city concerning the architectonic, social and environmental aspects, with specific regard to the areas that are less protected and therefore more easily subject to alteration or destruction of their distinctive traits.

The next few pages contain details of all the stages described above.

Identification / description of the resources and their vulnerability

Landscape resources



Landscapes

1 - The landscape sections "delle Masserie". This section of landscape, which extends to the East and West of the town, includes two basins: the ancient alluvial plain of Casaglia to the West, and the ancient alluvial plain of Ferrara to the East. This corresponds to the areas which underwent the extensive, ancient reclamation projects of Casaglia, Diamantina and the Great Reclamation Project of Alphonse II.

Settlement and physical characteristics. This section of landscape wrapped around the centre of Ferrara is the only settlement with any significance with regard to trade activities, whereas the other centres of very modest size took the shape of exclusively agricultural centres. Alongside the oldest farming settlements which are organised conventionally (*planted land grid of a rural nature with aligned elements*), there are areas with the larger, regular 'Ferrarese' type agricultural arrangements. With regard to the settlement area it can be noted that the most ancient nuclei develop over a winding course but progress nearly parallel to the Po (Porporana, Ravalle), or are positioned orthogonally to the Po (Pontelagoscuro, Francolino, Sabbioni).

Main specific protected elements:

- a) Historic roads: Virgiliana provincial road, Ferrara-Cento provincial road, route along the Po from Ferrara to Francolino-Pescara-Sabbioni-Fossa d'Albero;
- b) Scenic roads: Casaglia - Porporana route;
- c) Main humps: paleochannel of the Po coinciding with the Virgiliana road, the Porotto hump, humps of the Po and the Po of Volano;
- d) Main hydrographic network and wetlands; determining the presence of the Landscape Unity 'of the natural fluvial environs', especially the course of the Po immediately to the North;
- e) Planned agricultural environs: the main planned area is the Diamantina reclamation area;
- f) Parks: Parco Bassani to the North of Ferrara, on the sediment of the ancient Barco;
- g) Sites and landscapes worthy of protection: hump strip along the Po, hump of Poatello, areas overlooking the Volano route.

2 - Landscape section 'delle Valli del Reno'. The area involves the Reno paleochannel and surrounding areas.

Settlement and physical characteristics This section of landscape has two different setups that depend on the altimetric profile: an older settlement area where S.Martino and Montalbano up to the Po of Primaro are situated;

a second area that corresponds to the basin to the West of the old Reno; mainly a reclamation area, the division of the land is wider with respect to the previous area, with regular grids, clearly of an artificial nature. The Reno with its mighty embankments constitutes a very important visual landmark, a real physical limit between the Ferrara area and the Bologna area. In this section of landscape there are the more conventional typologies with 'separate or aligned elements', in addition to typologies with juxtaposed elements.

Main specific protected elements:

- a) Historic roads: S.S. Porrettana route, Ferrara-Cento provincial route; these routes are characterised by a high level of anthropisation;
- b) Scenic roads: S.P. Bivio Passo Segni road until Marrara; road sections along the embankment of the Po of Primaro;
- c) Main humps: Reno and Po of Primario and related paleochannels;
- d) Hydrographic network and wetlands; aforementioned water courses;
- e) Planned agricultural environs: Sammartina reclamation area and reclamation basin to the West of the old Reno;
- f) Sites and landscapes worthy of protection: sections overlooking the paleochannel of the Po of Primaro.

3 - Landscape sections 'delle Terre Vecchie'. This section of landscape is situated to the Southeast of the town. It includes the most ancient humps, which from Ferrara branch off into: the hump of the ancient Po of Ferrara, the hump of Volano, whose settlement origin split mainly due to the double section defined by the river and its extremely wide bend, and the Po of Primaro. The centres, even though of small dimensions, have ancient nuclei of definite interest especially if appreciated as a historic-settlement system.

Settlement and physical characteristics. The relationship with the waterways is clearly evident in the structure of inhabited centres: in the morphological structure (mainly hinged on a thoroughfare which is parallel to the river, with perpendicular offshoots connecting to it) and in the toponymy (there are frequent 'port alleys'...). The pattern of farming land is mainly grid-like and orthogonal with respect to the waterways, and the cut of the land areas is small-medium (planted grid). In some areas the land

grid is more irregular. This section of landscape has a good number of scattered settlements of historic/artistic value, situated along the main historic thoroughfares. The predominant typology here is clearly 'separate or aligned elements.

Main specific elements:

- a) Historic roads: routes of the old state road, the SS16, along the Primaro road, routes of the provincial road for Comacchio along the Volano road, route of the paleochannel of the ancient Po of Ferrara;
- b) Scenic roads: embankment road sections along the Volano and Primaro roads;
- c) Main humps: coincide with aforementioned elements;
- d) Main hydrographic network: the Po of Volano and the Po of Primaro;
- e) Planned farming areas: the presence of reclaimed basins is limited to the areas of the Palminaro meadows and at the eastern end of municipal territory;
- f) Sites and landscapes worthy of protection: ancient humps still intact and recognisable.

A noteworthy landscape environment is defined within the landscape section 'delle Terre Vecchie', as part of the territory in which the typical characteristics of the Landscape Sections are still easily recognisable and have a high level of landscape quality. This environment, between the Pomposa road to the North and the underground to the South, is mainly characterised by the following landscape elements:

- the bend that the Po of Volano forms between Cona and Codrea and its wide holm, extensively cultivated and significantly compromised by the urbanisation near the built-up centre of Cocomaro, but equally recognisable due to the altimetric profile with respect to the surrounding territory and the band of vegetation;
- the paleochannel of the ancient water course of the Po which, breaking off at the height of Codrea, runs towards Quartesana and Voghenza;
- the historic embankment routes and the ancient road for Comacchio;
- the tree-lined roads, mainly represented by high rows of sycamores on the Comacchio and Pomposa roads, but widely present, even if in a discontinuous fashion, mainly with elms, on the minor road network;
- the reclamation channels and stretches of water, formed by pulp mills, especially numerous between the bend of the Volano and the Scorsuro channel, and some basins resulting from quarrying activities;
- the inhabited centres of Cona, Quartesana, Codrea and Cocomaro;
- the colonic courts and landowners' villas, sometimes surrounded by parks, especially numerous between Codrea and Quartesana.

4 - Landscape sections of the natural fluvial environs. This section of landscape coincides with the route of the great Po and its immediate morphological environ, and qualifies as a special element of naturalistic value.

Physical-naturalistic characteristics. The area is made up of the river bed and its holms.

The Isola Bianca and its holm areas have special naturalistic value.

Main specific protected elements: the distinctiveness of this Landscape Unity is that it corresponds to a specific naturalistic element.

Identification / description of the resources and their vulnerability

NATURAL LANDSCAPES



Plant elements of the territory: *rows and hedges, isolated trees, retting pools*

In the territory of Ferrara the following types of landscape can be identified:

-the Po landscape, some remains of riverside woodland/lakeside woodland (of which the Porporana wood possibly constitutes the most important example), characterised by tree coverage made up of white hornbeams, elms, white poplars, black poplars and white willows, characteristic of the Po valley forest, but also numerous poplar plantation systems, which have partially replaced the original vegetation.

-the landscape and drainage structures which have, over the centuries, almost completely redesigned the environmental picture of the Ferrara territory, expanding areas and defining an artificial, adulterated landscape in which the uniformity of large spaces prevails, seemingly levelled, of large open fields, almost without trees, housing and actual inhabited centres. The main landscape elements are the channels, embankments, drains and draining pumps. The significant presence of water and humidity ensures that fog must be considered as one of the fundamental elements of this landscape.

-The landscape of the 'old lands' designed by meandering channels such as the Primaro or the Volano bordered by marsh reeds, black poplars and white willows, cultivations of contained proportions and ancient private residences, farmhouses, sporadic parish churches and small built-up hubs. The 'old lands' are usually characterised by intensive farming, where rectangular fields are still sometimes interspersed by rows of trees, wheel tracks and headlands. In addition to these environs, various types of vegetation can be cited that make up this specific landscape: poplar plantations, rows of sycamores along the roads, riparian vegetation, slim rows of Lombardy poplars along the edges of some fields, a few isolated trees etc. This initial mapping of the Ferrara landscape has allowed us to recognise some 'figures', some main forms which, due to their expressive strength, stability and close relationship with the geomorphological conditions of the land or also due to the important public/social role, can be considered as 'structural'. The vegetation and poplar plantations concentrated along the Po, the large suburban tree-lined roads which, as a kind of 'green tunnel' connote the eastern part of municipal territory especially, the network of urban green area which is very structured within, the various exceptional elements, brief scattered rows of Lombardy poplars, large isolated trees etc. which, even though not very frequent, stand out on the horizon contributing to defining the lines of a fleeting glance, to 'measuring' a space otherwise dominated by just the waviness of the land (existing and ancient riverbeds, humps, embankments).

VULNERABILITY

In the last fifty years agriculture has been changed by a technological revolution that has involved more intensive methods of farming. Simultaneously the rural territory has suffered the pressure of other business activities, urbanisation and industrial development.

The yield and productivity of agricultural cultivations have made great advances to the detriment of the conservation of elements of particular environmental interest such as retting pools, hedgerows, trees and hedges. The current Po valley landscape is mainly characterised by stretches without spontaneous vegetation and an intricate web of infrastructure (roads, railways, electricity lines etc.) that connects a myriad of urban centres with industrial estates and small business areas, therefore it is difficult to imagine how natural aspects such as hedges, hedgerows, woods, occasional forests and small and large wetlands were a dominant component of the landscape and plain environment until only fifty years ago.

This pleasing, varied aspect of the landscape did not result from exact aesthetic requirements but rather from a well-established balance between anthropic production activity and the natural environment, constructed laboriously during past centuries, starting in Roman times.

Nowadays the Ferrara plain is characterised by long fields perfectly levelled with underground drainage and without ditches, often with single crop systems over tens or hundreds of hectares with no meadows or long-term legumes in rotation and therefore without vegetable coverage for most of the year, with the resulting exposure of the soil to erosion and rainwash, significant reduction of organic substance in the soil and therefore natural fertility, scarce existence or lack of tree vegetation and spontaneous shrubs.

As a result there is a general impoverishment of biodiversity and in the landscape, and above all the absolute need to use chemical fertilisers and weedkillers in large quantities systematically to obtain satisfying yields, with the resulting problems of eutrophication of water and pollution of groundwater, also aggravated by the concentration of thousands of animals on farms with little land.

There is a lack of legislation to safeguard and restore natural elements such as hedges, woods, trees, retting pools or small pools, unlike the situation with the wetlands, for which the process of

recognition as environments that host special living organisms that perform important ecological and economic roles commenced in the '70s with various national, EU, and international bills that officially sanctioned and promoted their protection and restoration.

In the rural plain areas, beyond the reasonably extended wetlands and the retting pools for processing hemp, there were numerous ponds and lakes, in other words small basins with modest embankments, often constructed in lowlands with aquifers rising out of the water or in rainwater collection points for various activities, connected to livestock watering places and at times to small farms (fish, ducks) and also used as a water reserve.

Starting in the '50s and '60s, in the areas of the plain with the rationalisation of farm systems and the setup of an efficient network of irrigation channels, small ponds were quickly eliminated following their loss of importance in the economics of the business.

In wooded areas also, the gradual introduction of agricultural mechanisation and the requirement to increase farming areas meant the disappearance of these elements, which are of great importance for the refuge and reproduction of wild flora and fauna in the vast sea of farming cultivations.

Currently, the grounds of the exclusive villas and the historical assets, which the rural Ferrara territory is scattered with, remain the only islands where rare animal and plant species and centuries-old tree specimens have survived.

The municipal territory of Ferrara has undergone extensive anthropisation and is characterised by insurmountable barriers such as the road infrastructure and increasingly larger urbanised areas. Therefore the natural and environmental heritage in the municipality remains quite modest.

In this context the fluvial flood plains constitute the main ecological corridors for plants and animals, and it is precisely along these areas that a large part of this heritage is developing.



Small widespread pattern: isolated trees, retting pools, hedges and hedgerows.



Emergence of vegetation: monumental trees, monumental hedgerows, woods and historic parks.



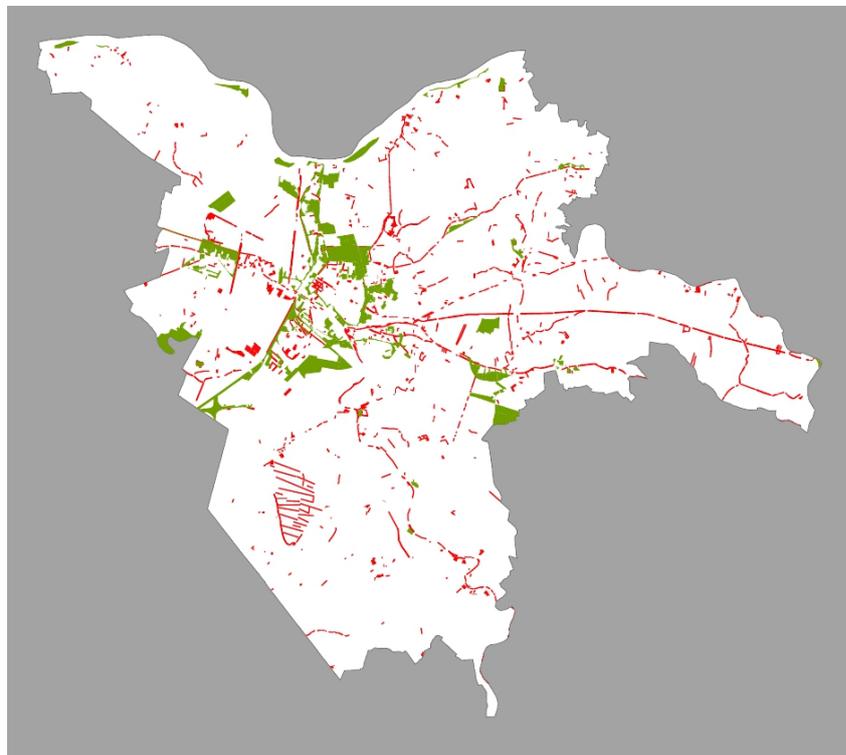
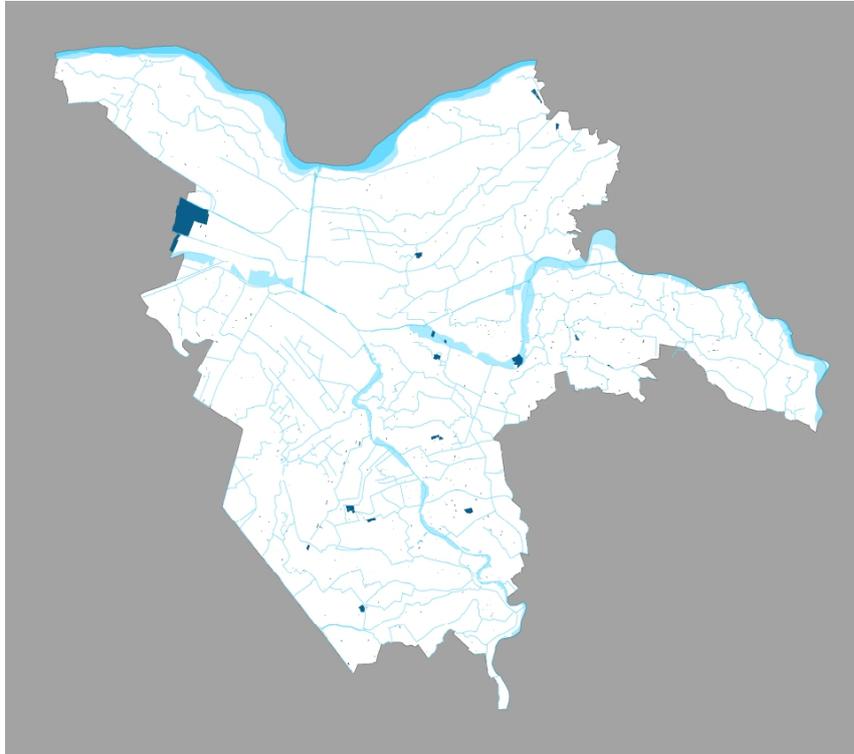
Green areas with a role: public and private gardens, park and recreational areas.



Green infrastructure areas: tree rows and hedges along the roads, railways and water courses, areas of sliproad vegetation.

Identification / description of the resources and their vulnerability

ECOLOGICAL RESOURCES



Water and territorial systems

On the Ferrara plains natural areas have been reduced drastically in quantity and variety, and tend to be increasingly isolated from each other. What remains are small fragments of natural habitats immersed in a sea of artificial environments, insurmountable barriers for animals and plants. It is therefore essential that these fragments are strengthened and connected to each other, with the creation of link thoroughfares and passages designed and created with the aim of forming a network.

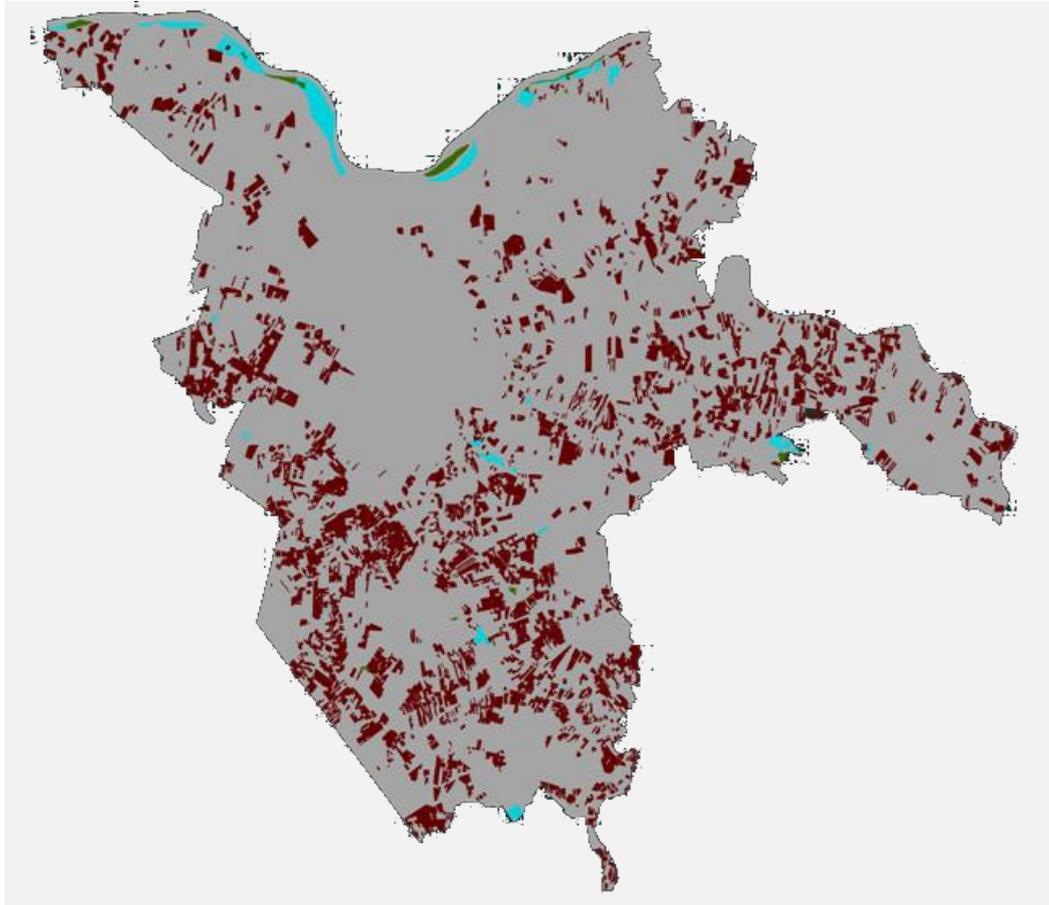
Since Roman times the Ferrara plains have undergone extensive changes over time, ever since the territory was deforested, drained and used for farming purposes until reaching present times, with the development of increasingly intensive farming techniques, and the increasing expansion of urban and industrial areas.

The landscape has been changed significantly by human activity, with animal populations and plants isolated and confined in small natural environments. The few ecological corridors and junction points in existence, comprising for example water courses, hedgerows, wetlands, woods and meadows, are often interrupted by various types of infrastructure that make it difficult, and sometimes impossible, for animals to cross.

Fragmentation of the territory tends to isolate habitats, increasing the risks linked to the immediate loss of species that require larger areas to survive, the reduction of genetic variation, and the difficulty for individuals who find themselves in the nearest habitats, in occupying the habitat where immediate local extinction transpires.

Identification / description of the resources and their vulnerability

USE OF FARMING LAND



Land use. Dark red: orchards; green: woods; light blue: poplar.

The Ferrara area is very much characterised by the world of farming – here the landscape almost exclusively coincides with the dictated forms of farming land use. With the desire to consider the environmental and landscape qualities of open space, it therefore becomes even more necessary to observe the farming production system carefully, trying to highlight some structural elements (buildings that change slowly) and also the recent transformation processes that are changing the economic structure radically (disappearance of small businesses) and the perceived landscape (reduction of fruit-growing areas).

Farming businesses

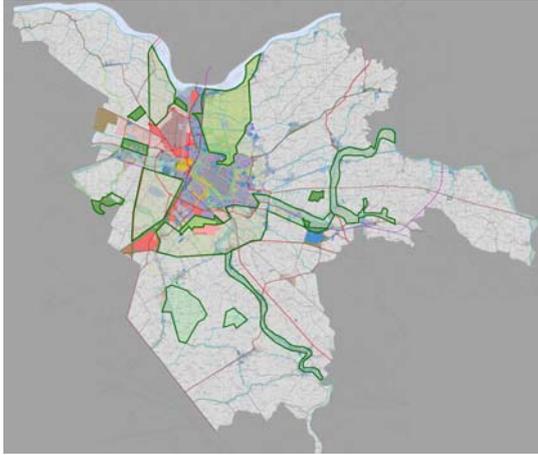
On the basis of data from the fifth general farming census in 2000, in the municipality of Ferrara there are 2107 farming businesses (20% of the 10,935 businesses registered in the Province). Between 1970 and 2000 the most important factor is the reduction in the number of businesses which went down to 2107 from 3287, a decrease of roughly 36%. In 2000 the total farming area in the municipality of Ferrara amounted to 32,000 hectares, the result of a gradual decrease which, from 1970 to 2000, basically led to the disappearance of 1286 hectares of farming land.

The most widespread crops are cereals, with a 38.5% share, industrial crops (beet, soya, sunflower) with 25.3%, and fruit with 17.9%. Arable crops include maize with 28.3% of the SAU (equivalent to 8019 hectares) followed by soya with 12.7% of the SAU (3584 hectares) and sugar beet with 10.5% of the SAU (equivalent to 2977 hectares). Soft wheat accounts for around 7.9% of the SAU (2240 hectares), whereas durum wheat represents 5.8% of the SAU (equivalent to 1638 hectares). Very important for farming in this municipality is fruit which, even though hit by a significant reduction, still covers 22% of the SAU (96207 hectares), and finally fodder with 5% of the SAU (1415 hectares).

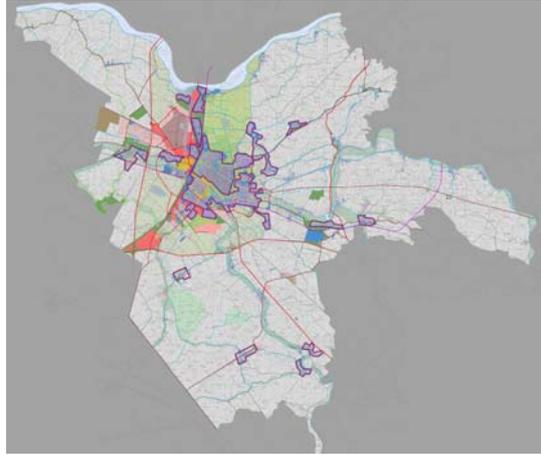
Animal husbandry. In recent years animal husbandry has shown signs of crisis (especially the cattle sector) mainly in relation to the application of the common agricultural policy, an increase in production costs, and competition from other European countries. There has been a decline in all animal husbandry sectors both in terms of farms and in terms of number of animals bred, arriving at the current figures of just 27 farms that breed cattle, for a total of 1642 animals (592 of which are dairy cattle). In the 1982-2000 period there was a drastic reduction in the number of farms (-82,5%) and total number of animals (-77%). The same situation occurred in pig farming - here the decrease in the number of farms was even more drastic (-89.5%) whereas the decrease in the number of animals was more contained (-61%). A particular decrease also hit poultry farming, currently represented by 7144 birds distributed over 311 farms split between chickens and laying hens, for an average of approximately 23 birds/farm; this latter figure confirms we are seeing small farms breeding for personal consumption. It is exactly these compound characteristics of the farming structure, and especially its recent transformations, that are pushing us to carry out further investigations. In particular, by recognising in fruit farming (and in tree farming in general) an element which characterises the Ferrara landscape significantly, by comparing the technical regional map created at the end of the sixties, the colour orthophotomap from 1998, and a direct field survey, we are examining the extent of tree farming, considering its drastic decrease. Obviously a town plan cannot (especially on its own) reverse economic/production trends that find justification in several wide-ranging multi-government processes. It can, and must, lead to recognising the irreplaceable role of farming in the construction of a 'beautiful landscape', an environment that can become a resource for the whole community.

Identification / description of the resources and their vulnerability

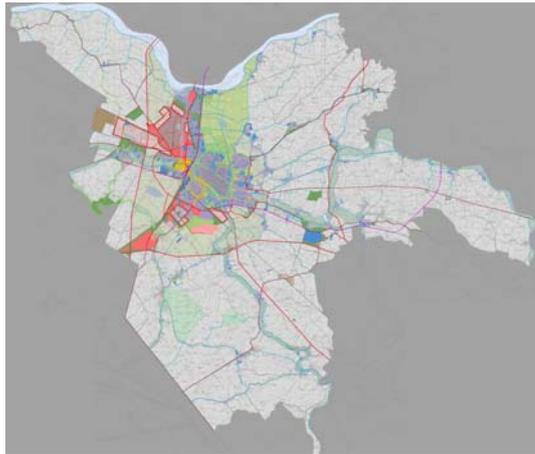
City Systems - Description



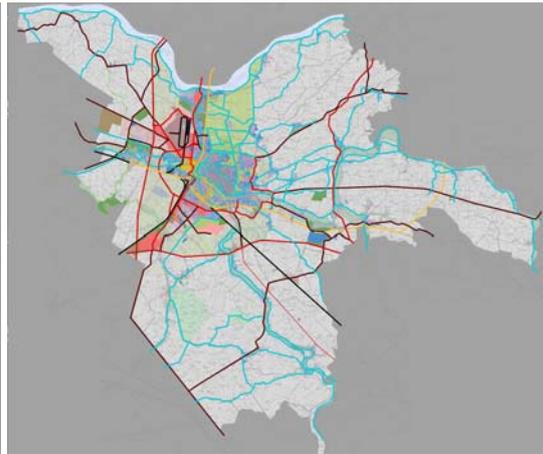
green areas



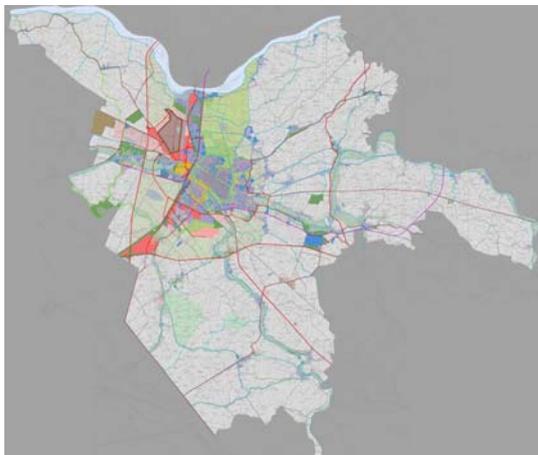
built-up area



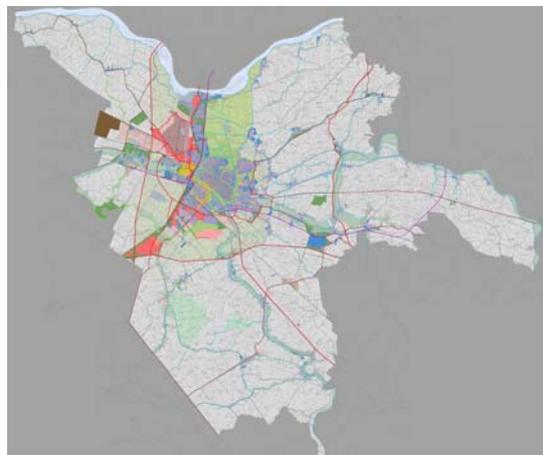
small and medium-sized businesses



road network



chemical and quarrying centre



The operation of the town: services and dimensions

The main systems include mobility, populated areas, production areas, the environment, and territory facilities.

These systems suggest possible modes of use in the territory, telling us about the operation of the town, representing a kind of crucial description, but also outlining possible scenarios for transformation and development.

a. The environmental system and collective facilities

The environmental system takes on different roles: that of infrastructure (providing a link between different environments and settings, the ecological network), that of an alternative town (large park whose specific design contrasts that of the town), and a resource and reserve role (fundamental element for ensuring water balance in the territory).

For the purpose of representing this combination of objectives the environmental system is split into a series of subsystems that define:

- structural geographical connection;
- the farming areas of the 'forese';
- the farming belt areas;
- the environs of Parco Bassani;
- environmental mitigation and compensation areas;
- green areas of the town;
- areas for collective facilities.

b. The populated settlement area

The populated settlement area includes the combination of residential areas, businesses, services and other closely related facilities. This settlement area recognises these differences and is split into the following subsystems:

- the historic centres;
- contemporary settlements;
- new centres;
- settlements of the first crown;
- centres of the 'forese'.

c. Mobility infrastructure system

The mobility infrastructure system includes the following:

- the automobile network;
- the rail network and cycling as an alternative for circulating;
- intermodality locations;
- river infrastructure;

d. The manufacturing area

The important contemporary changes to the structure of society and the town which have occurred in recent decades have also involved the economic structure significantly. In Ferrara the particular, specific structure of manufacturing, characterised in past decades by the almost exclusive presence of the chemical sector, has undergone significant variations relating to this.

Other structural transformations are associated with this trend in the farming industry, in relation to more general changes which are also however characterised by progress in specific sectors such as the fruit market and sugar industry.

Nowadays manufacturing is characterised by the dimensionally homogenous and organised presence of small and medium sized businesses, with the possibility of renovating the large petrochemical company. The particular structure of industrial/small scale manufacturing and farming has enabled the containment of the expansion of small and medium-sized businesses within industrial areas, without causing the phenomena of dispersion and extensive employment in the territory. However the Ferrara economy is also characterised by the significant presence of other components such as university-level education, tourism, museum activities etc., defining an overall picture based on a multitude of activities, each of which involves various parts of the town.

The manufacturing system is split into the following subsystems:

- the automobile district;
- the chemical complex;
- the fruit and food and farming district;
- small and medium-sized businesses;
- large technical services, quarrying centre.

Identification / description of the resources and their vulnerability

Socio-economic analysis

Demographic factors

The demographic dynamics of the town of Ferrara are linked to a significant demographic fall. The rate of ageing of the population is the highest in Italy, if compared with the other 103 provinces. From the last population census (ISTAT 2001) it transpires that the territory is characterised by low density per square kilometre (322.7 inhabitants).

This trend towards demographic decline and ageing of the population could have repercussions on production activity in the province, which is in 20th place among the 70 provinces in the Central North for the rate of industrialisation and in 9th place for the increase of workers from 2003 to 2005 (ISTAT 2001). However, while industry still holds an important place in the Ferrara economy, farming and the service sector are suffering significantly.

Tourism is a great local opportunity, but Ferrara lidos in particular are experiencing an image crisis due to their deterioration from an environmental perspective.

Tourism relating to Ferrara as an art-lovers' destination is increasing however, but this concerns short breaks that generate little for link industries, as the average stay of tourists is just 2 days.

The expectation is therefore a decline in the population, employment and income.

Sector production activities

Agriculture

The province of Ferrara is characterised by a large, mainly rural territory, where farming has deep historic roots and has determined not only the economic development model, but also the relationship of mankind with the environment. The crisis in the sector has forced operators to develop new strategies and concentrate on more profitable production. To this effect the link with the food and farming sector seems indispensable. A similar argument is valid for the fishing industry, where the intensive exploitation of resources over the long term is unsustainable, and to this effect aquaculture seems to be an important opportunity.

Industry

There are two distinct areas within the province, the high industrialised areas (Ferrara uplands), with similar characteristics to Bologna and Modena, and the reclaimed medium-low Ferrara area, which is mainly agricultural with low residential and production density, marked by the presence of the Po Delta and the Regional Park.

The contribution of industry is increasing in some areas of the province - it is concentrated in the Ferrara uplands where there is a type of engineering district in which the medium to large-sized companies involve many small to medium-sized suppliers, in the chief town, where the petrochemical industry is based which, despite a reduction in workers, has managed to keep excellent companies and international research centres.

Important industries are based in the Copparo area such as Berco and BBS, in the area of Ostellato, due to the presence of the SIPRO area, in the municipality of Codigoro (Conserve Italia and Falco) and in the area of Argenta.

Commerce

In terms of number of companies the business sector represents the most important sector in the province of Ferrara after agriculture. As at 31st December 2007 there were 7427 companies operating, 21.2% of the general total.

This figure includes retail and wholesale businesses, intermediary and repair businesses. Development concerns large specialist areas and supermarkets, whereas a re-dimensioning process is noted for the large chains. In the province of Ferrara hypermarkets employ approximately 1200 workers distributed in 7 shopping centres over an average area of 5600 m².

A fairly positive factor in this context was the progress of large retail chains, in addition to smaller specialist shops located in the town centre - in 2007 an increasing polarisation in consumption was highlighted, mainly in favour of local clothing shops in the historic centre.

(Source: Ferrara Chamber of Commerce research office).

Services

With regard to services, Ferrara is characterised by the presence of its old prestigious University, which serves a wide catchment area. Ferrara could become a town for the study of the arts, both in terms of its quality of life, the quality of its teaching, and the possibility for research and development.

Tourism

Tourism in the Ferrara area is made up of environmental resources, events organisation and tourist services, hotels, restaurants etc. Tourism is an important element within the economic framework of the province of Ferrara, and as a result the Piano Territoriale di Programmazione Provinciale (PTPP) (Provincial Territorial Plan (PTP) has dedicated a specific section to tourism within the wider sector named 'economic system', making it the subject of proper territory planning.

More specifically, the actions planned for the Municipality of Ferrara are becoming a reality in planning that provides for urban works designed to raise the tourist profile of the territory and the town.

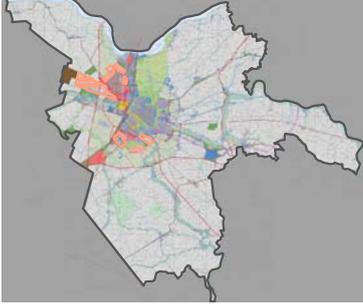
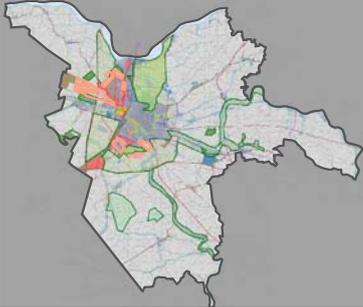
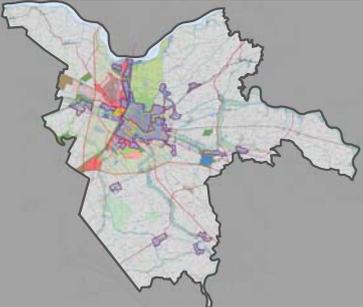
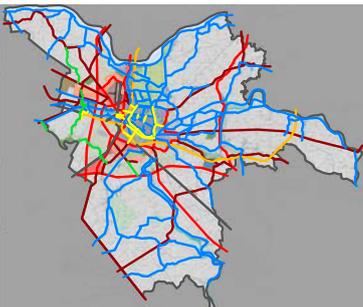
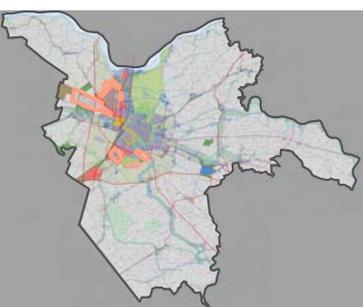
The identified objectives can be summarised as:

- expansion of the 'cultural tourism' product;
- affirmation of Ferrara as a residential cultural centre and a place to carry out activities not only on an occasional basis but also on a more ongoing basis, relating to the world of art and culture;
- expansion of the offering towards new products and markets;
- practical connection of Ferrara with its province, by means of strengthening and developing water courses, historic routes and large environmental corridors.

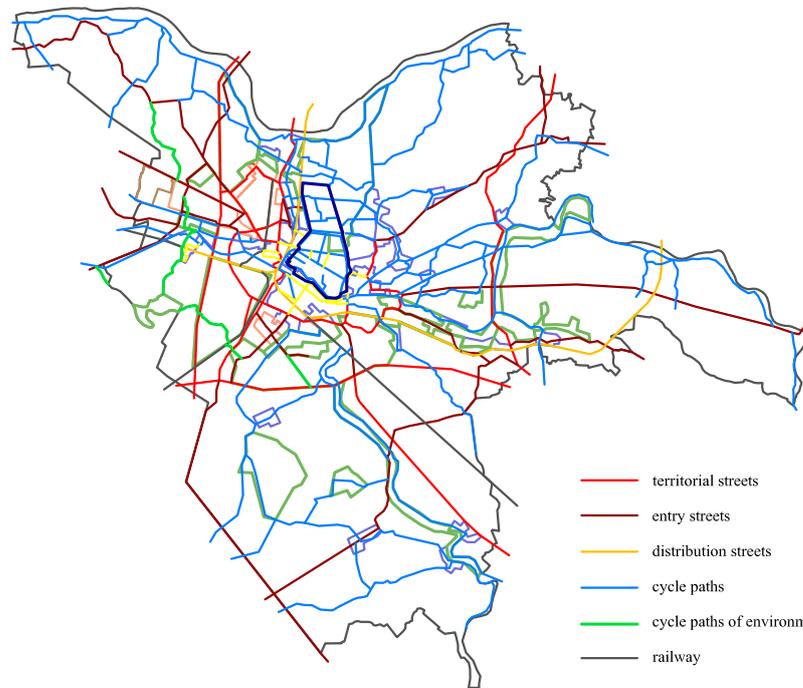
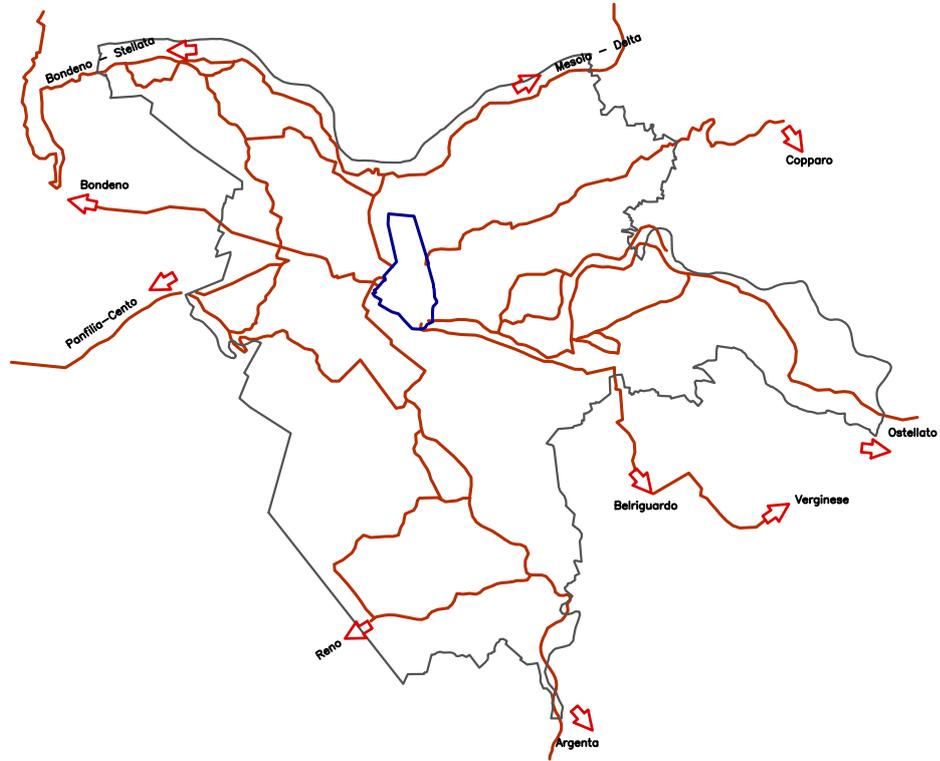
Methodological approach to the conservation of HUL: the case of Ferrara
 Division of the territory into macro-areas.

	Protection laws
	<p>WORLD HERITAGE LIST</p> <p>The UNESCO heritage area includes Ferrara historic centre, the system of the Delizie and the Emilia stretch of the Po delta. The core zone and buffer zone include the most important river beds that are still visible and the historic mobility network (roads and waterways), which complete the design of the Ferrara territory built between the Middle Ages and modern times.</p> <p>The site perimeter, as concerns the surrounding territory and the Po Delta can be divided up into 4 families:</p> <ul style="list-style-type: none"> - the area that connects Diamantina to the west of Ferrara - the area that extends to the north of Ferrara up to the Po, including the Town Park and Fossadalbero; - the area of the ancient Po di Volano which starts from Ferrara and runs to the sea, including the Pomposa monastery, the Mesola castle, the nearby Boschetto through to the territory of La Mensa; - the areas comprising the ancient waterways starting from Ferrara both heading south, including the <i>delizie de Belriguardo, Benvignante</i> and <i>Verginee</i> and east to Comacchio.
	<p>LANDSCAPE BOND</p> <p>It includes the areas which have particular landscape interest, rivers and waterways, woods and other archaeological areas as defined in art. 142 D.Lgs. 42/2004.</p>
	<p>MONUMENTAL BOND</p> <p>it coincides with the border of the walled city and the north area of the historic centre</p>
	<p>LANDSCAPE RESOURCES</p> <p>the territory is divided in 4 unity of landscape, as follow:</p> <ol style="list-style-type: none"> 1. Farmhouse landscape (paesaggio "delle Masserie") 2. Reno valley landscape (paesaggio "delle Valli del Reno") 3. Old lands landscape (paesaggio " delle Terre Vecchie") 4. Landscape of the natural river environments (paesaggio "degli ambiti naturali fluviali")
	<p>SIC</p> <p>it is represented with the landscape unity 4 : "landscape of the natural river environments" whose characteristic is to correspond to a specific naturalistic element.</p>

Methodological approach to the conservation of HUL: the case of Ferrara
Systems

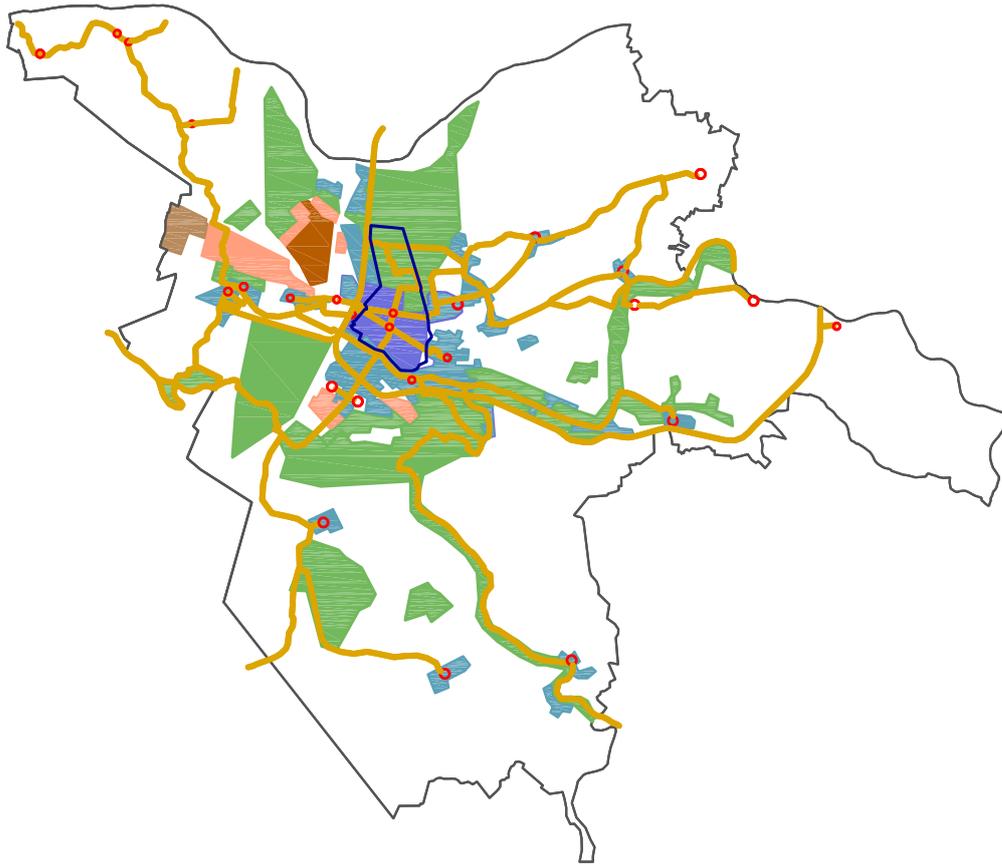
	SYSTEMS
	<p>chemical and quarrying centre</p> <p>located in the east area of the centre</p>
	<p>green system</p> <p>extremely relevant in the territory of Ferrara, it takes on different roles: it is an infrastructure (connection element between different scopes and environments, ecological network); it is an alternative city (large park that opposes its specific design with that of the city); it is a resource and reserve (essential element in guaranteeing the hydraulic balance of the territory).</p>
	<p>built-up system</p> <p>The settlement living system consists of the set of residential and commercial locations, the services and equipment strictly connected with it, particularly concentrated and inorganic around the historic centre and characterised by settlements dotted all around the territory.</p>
	<p>mobility system</p> <p>The mobility system, which is extremely complex, includes:</p> <ul style="list-style-type: none"> - the automobile; - the railway and cycling mobility as an alternative method of transport; - intermodality; - river infrastructures.
	<p>small and medium enterprises</p> <p>the specific structure, both of the industrial-artisan production world and of agriculture, has enabled growth of small and medium sized enterprises to be limited to within industrial areas, without giving rise to dispersion and extensive territorial occupation.</p>

Ferrara a city on the net



New networks and connections

The centre: urban axes and centrality

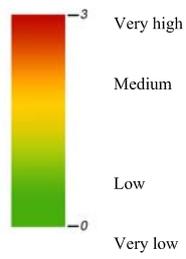
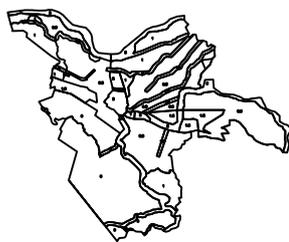


Extending the system of collective spaces and social parts that so strongly mark the city within the walls to the parts of the contemporary city and those showing such great functional and spatial homogeneity.

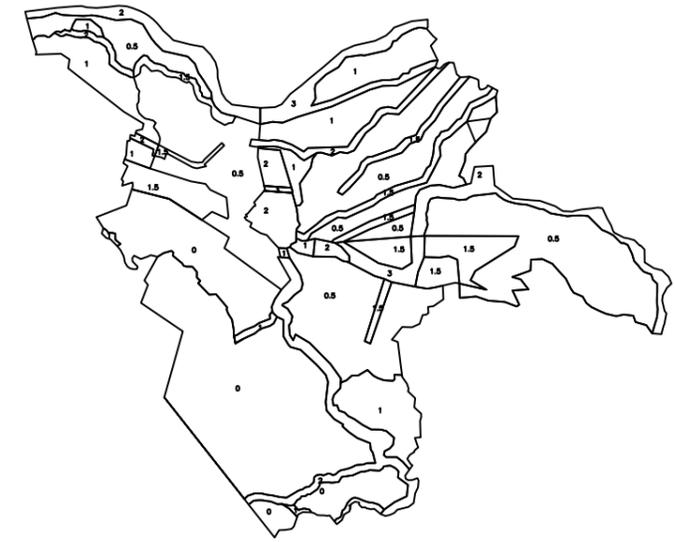
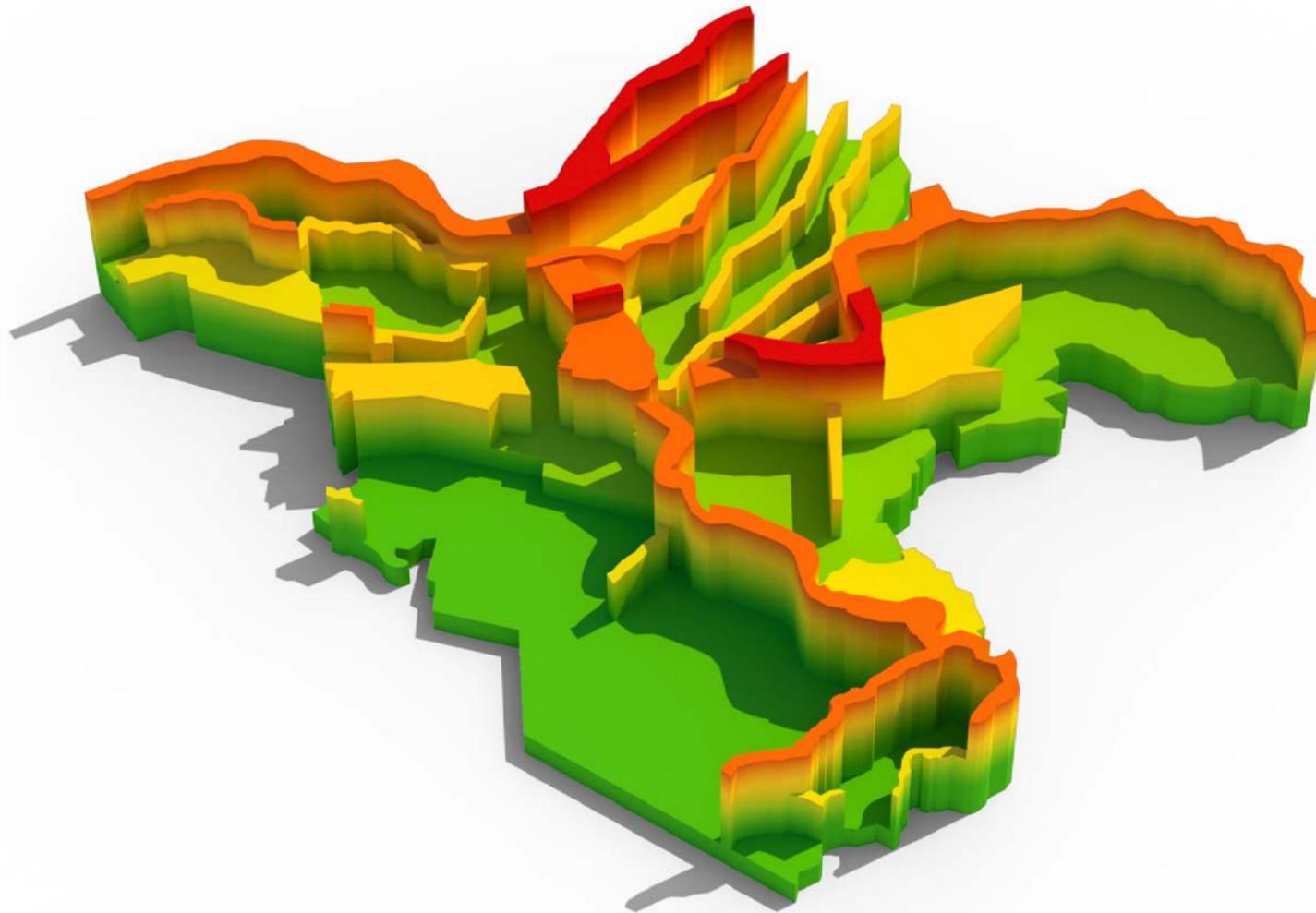
Intensity map



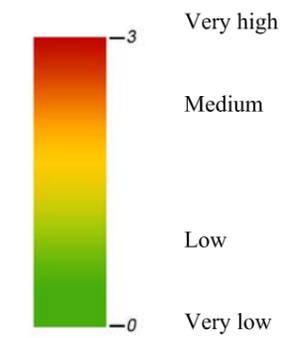
IMPORTANCE OF THE RESOURCES



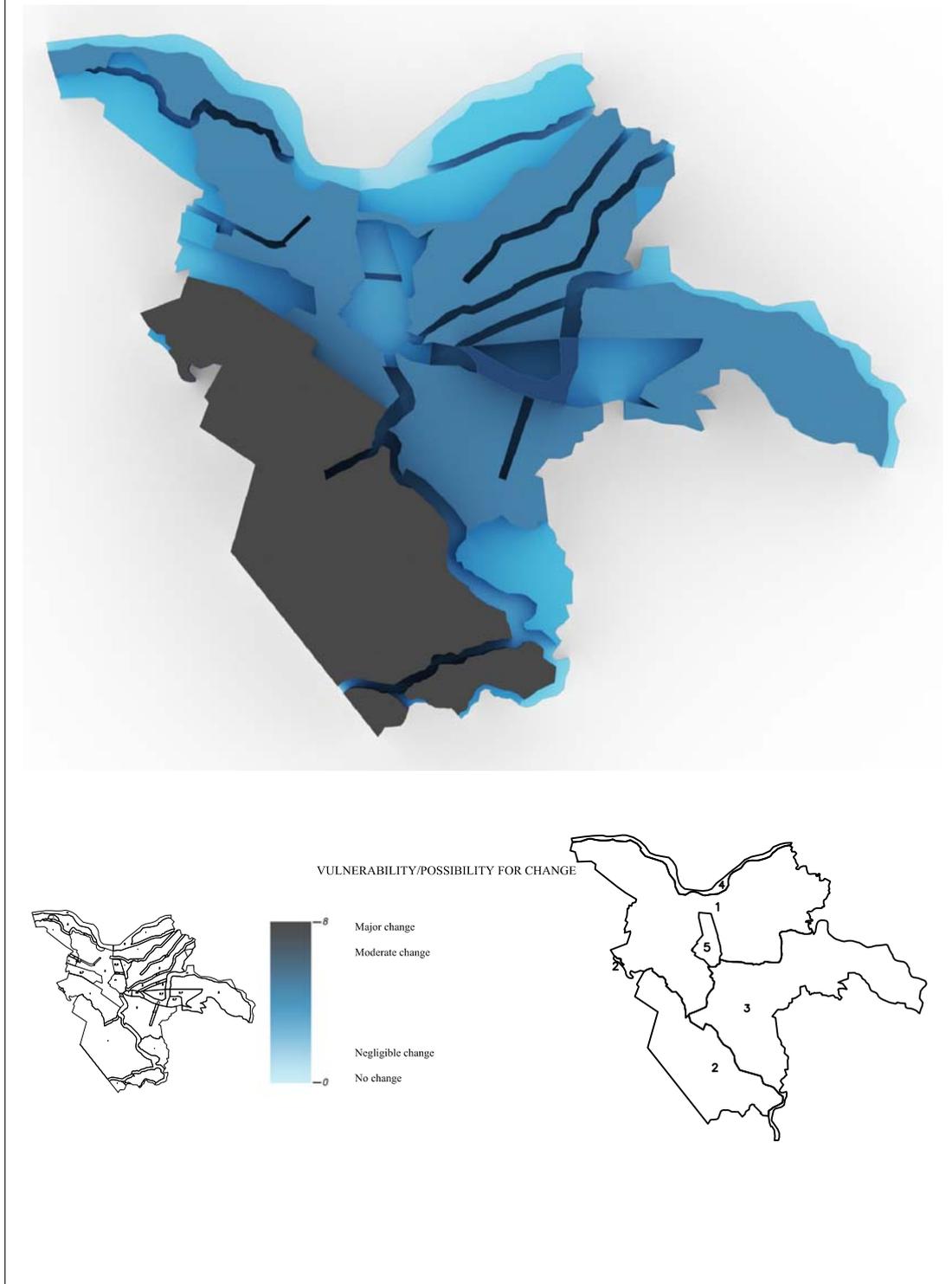
Intensity model



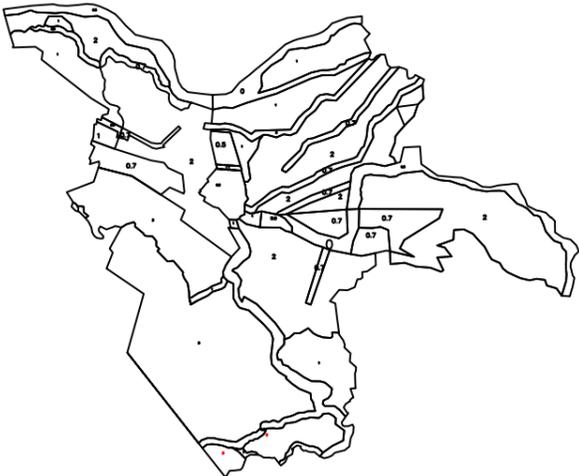
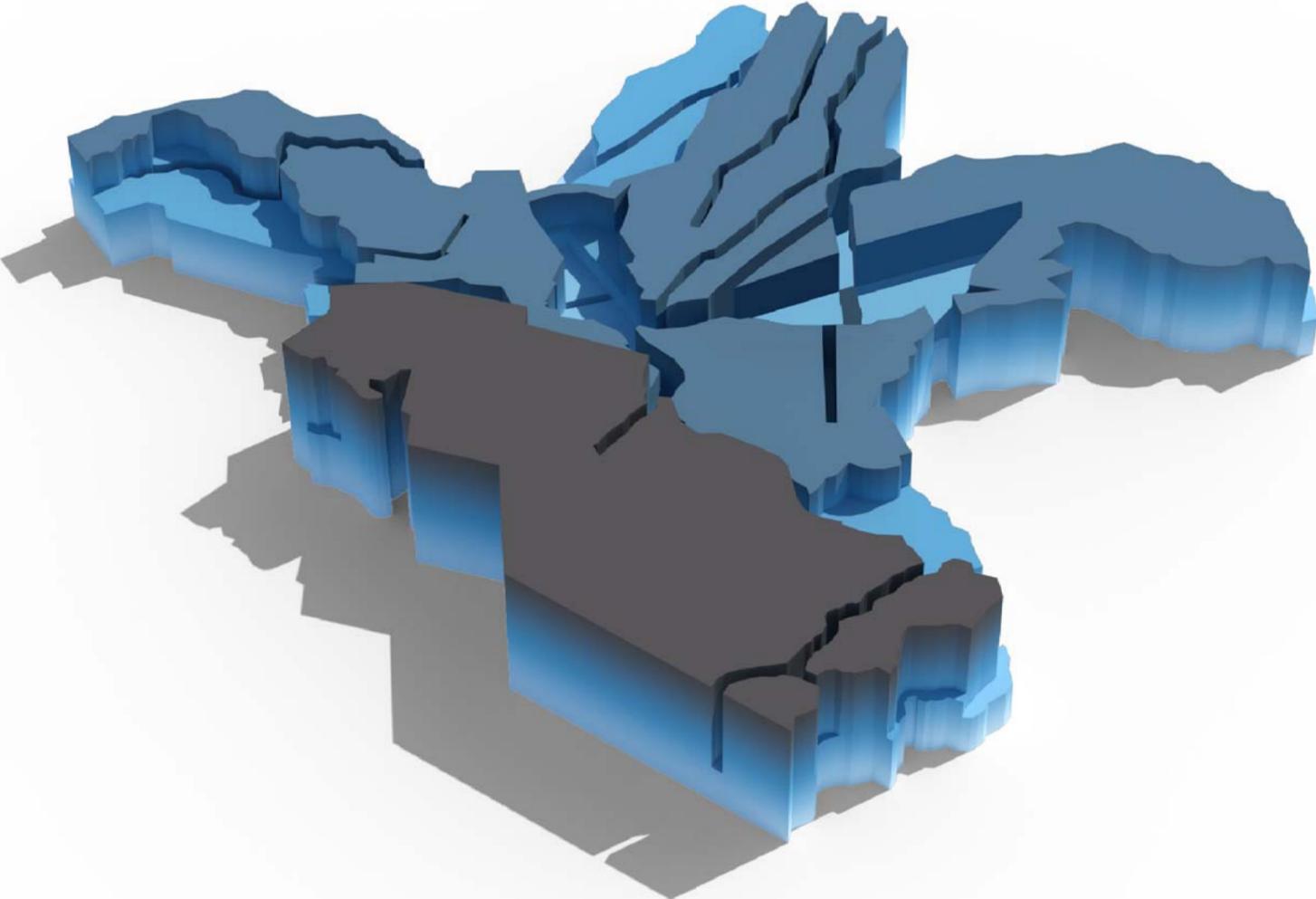
IMPORTANCE OF THE RESOURCES



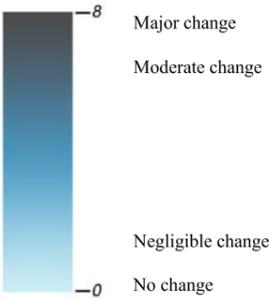
Vulnerability plan



Vulnerability model



VULNERABILITY/POSSIBILITY FOR CHANGE



19.3. GENERAL GUIDELINES FOR THE CONSERVATION AND DEVELOPMENT OF THE HUL: THE CASE OF FERRARA

19.3.1. Strategic choices for territorial development and structure.

The analysis carried out thus far has led us to identify the main **systems** characterising the historic urban landscape of Ferrara, consisting of mobility, living, production, the environment and the territorial features.

These systems evoke possible ways in which the territory can be used; they tell us of the city's function, representing a sort of critical description but, at the same time, they also outline possible scenarios for the transformation and development of the historic city in respect of the qualities characterising it.

The possible strategic scenarios that can be used to outline the possible development of Ferrara can be identified as follows:

a. Working on the existing city.

One possible scenario may be to work on the existing city: this therefore means not seeking any new urban “additions”, and, therefore, accepting that it is impossible to establish new urban limits and a closed, pre-defined “form”, but rather to transform the metamorphosis of the existing city into a value.

Working on the existing city does not mean renouncing imagining new futures or building the city to the measure of the existing society, but rather it is proposing an idea that develops amongst its folds, and which is able to explore the potential of the various contexts in order to redeem the often preconceived idea we have of the contemporary city.

Hence the idea of working above all on networks and connections.

The urban environments comprising the city appear to be complete in their form, yet still somewhat lacking in functions and uses. It therefore becomes important to increase the level of “urbanity”, the internal layout and, perhaps, the social “biodiversity”. These hypotheses connect up with the opportunities offered by the recovery of urban areas that are no longer used, with a view to obtaining an overall urban requalification.

b. Expanding the centre or, bringing the quality of the centre to the rest of the city.

In Ferrara, the problems typical of historic environments, connected with the simultaneous presence of the uses and needs of the contemporary city and spaces and places deriving from the stratification of the historic city, assume relevance above all for the role played by the walled city with respect to the rest of the territory.

In actual fact, the old part of the city does not purely consist of a location for the memory of an important past, but rather it is a major political-administrative centre in which activities on various scales (universities, museums, etc.) go towards making up the overall city economy.

The idea is to export the quality, density and blend of functions, services and equipment marking the ancient centre to the external urban parts.

The idea of strengthening its “urbanity” also comes as part of the hypothesis of working on the existing city, extending the system of collective spaces and social parts that so strongly mark the city within the walls to the parts of the contemporary city and those showing such great functional and spatial homogeneity.

Expanding the ancient centre does not, therefore, mean extending the strip of restrictions implemented to protect a vaster territory, but instead, including the external parts of the city in the vitality and wealth of opportunities today characterising it.

This can be done both through the redefinition of the role of the most important roads leaving the centre and by strengthening the network of spaces and collective places that are currently separated and fragmented, as well as by putting services, equipment and, more generally, population “attractors” into place.

At the same time, expanding the centre also means increasing the quantity and quality of meeting points, recognising places, environments and perhaps a structure, which is currently hidden and which can be used in new and unexplored ways.

c. Establishing networks and connections

The main characteristics of the contemporary city, its formal undefined nature and the diversity of its functionally defined parts would appear to suggest the possibility of working on the re-connection of segments of network and urban fragments.

Different viewpoints stress the importance now held by connection networks and, in particular, mobility networks, environmental continuity systems and those of collective places, highlighting one of the most important tasks for the planning the contemporary city, or attempting to reconnect what the development of past decades has often delivered in a fragmented fashion. For example, roads can be reconsidered, not only as spaces necessary to the passage of vehicle traffic, but also and above all as important urban location systems in defining the city image.

In Ferrara, this applies in particular to the historical axles leaving the walled city, for the road systems of the so-called “Us”, for the interchange terminals and settlement car parks.

In a similar fashion, the environmental networks constitute an articulated fabric within which the large green surface areas of the parks and natural environments and the discreet presence of vegetation in rural areas take on a structuring role, both in terms of ensuring the correct ecological function of the territory and to improve life in the city.

These general concepts may become concrete in the main systems already identified.

The environmental system and collective equipment

Within this layout, one proposal may concern the provision for a "green city" to which functions and roles can be entrusted, which in existing settlements are only partially provided, in an isolated manner. The “green city” may represent a real complementary city to the existing one, comprising places and areas for relations. To this end, connection of existing and envisaged green urban areas and equipped surfaces (parks, school and sports areas, etc.), as well as other open areas of the city (tree-lined streets, lawns, etc.), may represent a first important operation. In wishing to distinguish and graduate the “level of naturalness” of the open spaces, this network can be seen as the most urban component of the environmental system, through which to redefine the ratio of the large sized rural space and the smaller area of urban environments.

A second, important component is the combination of agricultural spaces outside the consolidated city through which to design a sort of green “belt” assigned

the task of mediating the ratio of rural and urban space. These spaces play multiple roles: in some parts, the landscape role prevails, whilst for others, the role of safeguarding the environment becomes important and for yet others, it becomes important to recover an agricultural function, also hypothesising new, more innovative forms of running and/or farming.

Another subject is the recovery of environments that are very natural and recognised as vehicles of interaction with the environment.

These are river environments (water courses, meadows, river beds, etc.), which, with their permanent nature, are essential elements of the territorial structure of the *forese*, as well as those through which to establish the main connections between the various parts of the territory. The river system considered as a whole can then become essential to the territorial hydraulic function, in addition to being a material through which to bring together the geographic dimension of the rural territory with the urban environments of the city.

The living settlement system

One of the first “images” seen when speaking of Ferrara with the local inhabitants is that of a city that offers its historic centre as an element of comparison with the rest of the territory. A description that designs the city, juxtaposing the part within the walls with the countryside and outlying areas of the new residential districts.

At present, this juxtaposition, although still recognisable, no longer seems quite so strongly representative of the territorial context and the Ferrara society.

Despite the fact that “within” and “outside” the walls continue to denote very different environments, today it is the fragmentation and heterogeneous uses, spaces and ways of travelling that characterise the territory structure and, to a certain extent, the society. To this end, a first action may be to “expand the centre”, i.e. to extend the classification of the historic centre to the external parts of the city. The hypothesis heads towards extending the urban nature of the centre to the more recent construction fabrics behind the main city expansion directives around and along which the contemporary city has been built, and which could constitute the new “central places” to be enhanced.

The centres of the *forese* may in this way be proposed as new, sought-after places of residence. They would not be simple *frazioni* (or districts) of Ferrara, but

rather “specific towns” forming complex, articulated urban structures: along Po Grande, the Casaglia-Ravalle-Porporana and Francolino-Pescara-Sabbioni structures; along Po di Volano, the Cocomaro di Focomorto-Cona Codrea-Quartesana structure, the two centres of Contrapò-Baura and the Viconovo-Albarea-Villanova-Denore sequence; along Po di Primaro, the articulated structure of Fossanova-Gaibanella-S.Egidio-Gaibana-Marrara-Monestirolo, and finally the two centres of S. Martino and S. Bartolomeo.

The main aim is therefore to make these structures more cohesive, particularly as concerns the availability and use of services.

The “green” can take on an essential value as material for constructing and reconstructing connections between built-up parts. An image where the built-up parts are inter-connected by a grid of paths and green areas that may include, in addition to actual green areas in the strictest sense, also those pertaining to service equipment.

The system of infrastructures for mobility

The design of infrastructures and mobility has always characterised the design of the city, both because it interacts greatly with the problems relating to its growth and because it establishes immediate effects on the parties involved. In Ferrara, these general aspects have very precise features connected with the city’s recent growth to the south and west, to the dimension and form of the ancient city, to the presence of some connection axes with the vast area, the Po and the river system and, last but by no means least, the importance, in the overall balance of traffic, held by bicycle travel. To this end, the general design of mobility may include the introduction of new routes as an alternative to the classic connection routes, aimed at reducing the overload of traffic and at the same time connecting the various places of urban historic landscape.

The production settlement system

The production settlement area consists of various different consolidated realities, requiring inter-connection by means of territorial roads, services, correct hydraulic and environmental function.

Petrochemical. Strengthening the “chemical condominium”, in addition to constituting an important element for the development of the local economy, may

also prove to be the opportunity for activities using existing infrastructures and resources to become established.

The new areas for small and medium enterprises. The development of small and medium enterprises is perhaps one of the most significant recent phenomena that has affected the territory of Ferrara; it would be important to saturate the areas already assigned for production and located in the main to the west of the city.

The city of cars. With a view to defining new networks and new landscapes, connected both to the world of the car and the places where the city's main production businesses take place, we need to redefine some roads connecting the areas and settlements and crossed by them.

The centre. The size of the centre of Ferrara and its easy recognition as part of the city, are associated with the opportunities that it is able to offer in terms of economic development. The transformation of large areas, the enhancement of some important functions already present and the development that can be hypothesised for them (museums, universities, river tourism, etc.), the role and weight of commercial businesses and existing services, are all important opportunities for the economy of Ferrara as a whole.

The district of fruit and agricultural industry. The aim is to guarantee that agricultural produce is processed locally as far as possible, accompanying the sector restructuring process currently underway through the uniting of production groups, safeguarding employment and rationalising the service to the agricultural sector.

19.4. CITY DEVELOPMENT STRATEGY (CDS)/ CITY CONSERVATION STRATEGY (CCS)

In relation to the definition of CDS/CCS, an analysis of the protection instruments concerned by the territory of Ferrara has enabled the definition of the areas in which the “weight” of resources is greater and in which these resources are best protected: these are SIC areas, area included in the UNESCO core zone and buffer zone, the historic centre and areas involving the ancient water courses and riverbeds, which are protected by the landscape restriction, as envisaged by Italian Legislative Decree no. 42/2004.

These areas, as can be seen in the 3D (Intensity) model, visually create proper “walls”, barriers almost impossible to cross in which the “weight” of resources really is very high.

The areas behind the historic centre have been involved since the years of urban development, by a widespread, often uncontrolled development, and it is on these areas that we need to intervene, through the definition of a development/conservation strategy aimed at preserving the character and meaning of the historic urban landscape in respect of the ancient city.

In these areas, involved by the presence of the most important urban agglomerates, small and medium enterprises, the petrochemical industry and the most important production and commercial activities of Ferrara, the CDS/CCS envisage the requalification of the urban fabric, also present with the construction of new buildings, with a view to extending the concept of conservation that allows for a special focus on the development of the areas outside the historic centre, with a view to preserving the meaning of the whole historic city.

The city enclosed within the historic centre and immediately next to it, where resources have a greater weight, should be involved by the strict conservation limits (strictly no-go areas), whilst other areas of the Ferrara territory (partially intact areas that require careful attention to planning, design and implementation) for their morphology and geological and physical characteristics should be carefully assessed and preserved with the idea of further urban development.

In short, and as can be better seen in the attached cartography, the CDS/CCS establishes the following actions:

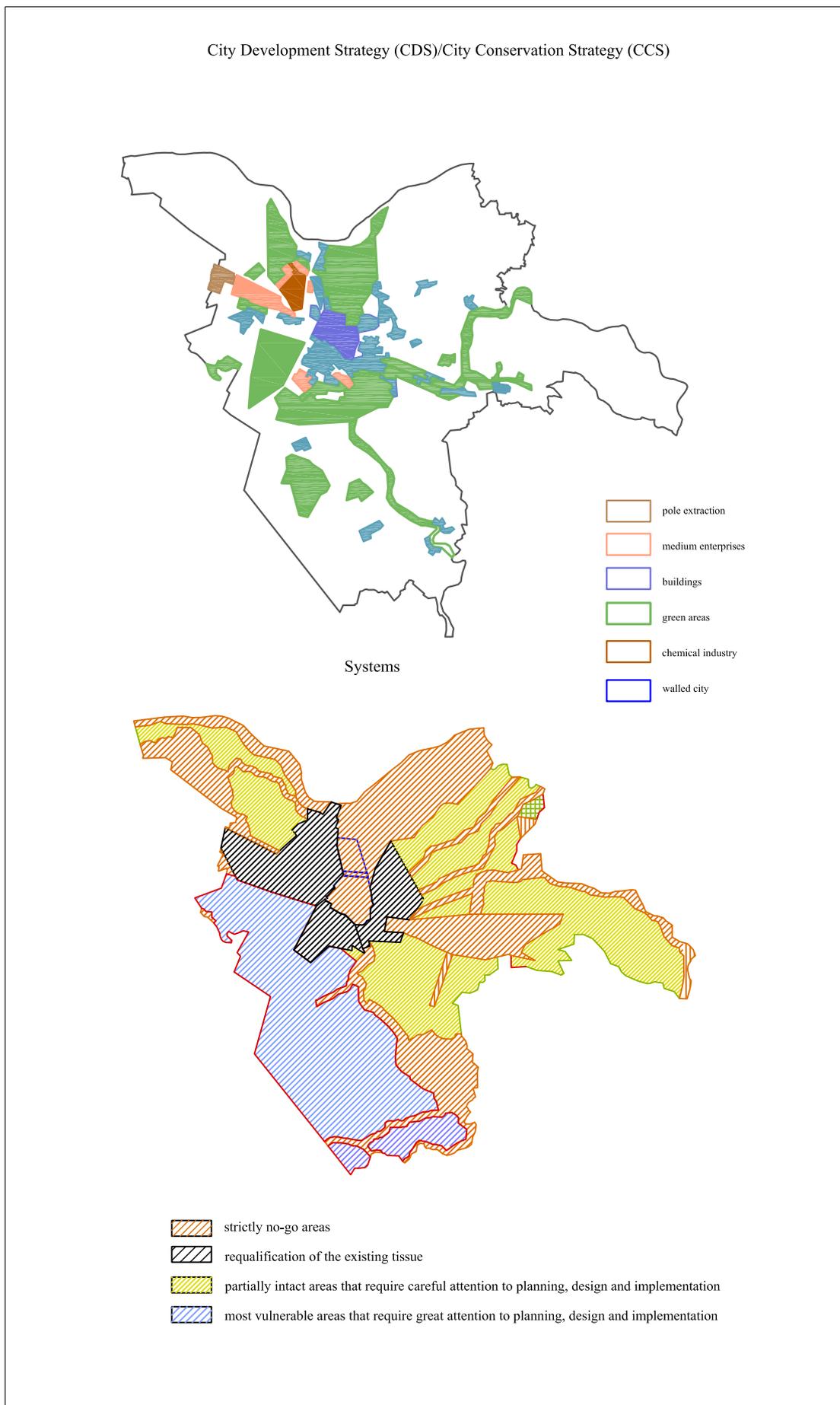
- **strictly no-go areas:** these are areas including the historic centre, the areas (partially) included in the core zone, the areas that are particularly important in terms of their landscape characteristics;

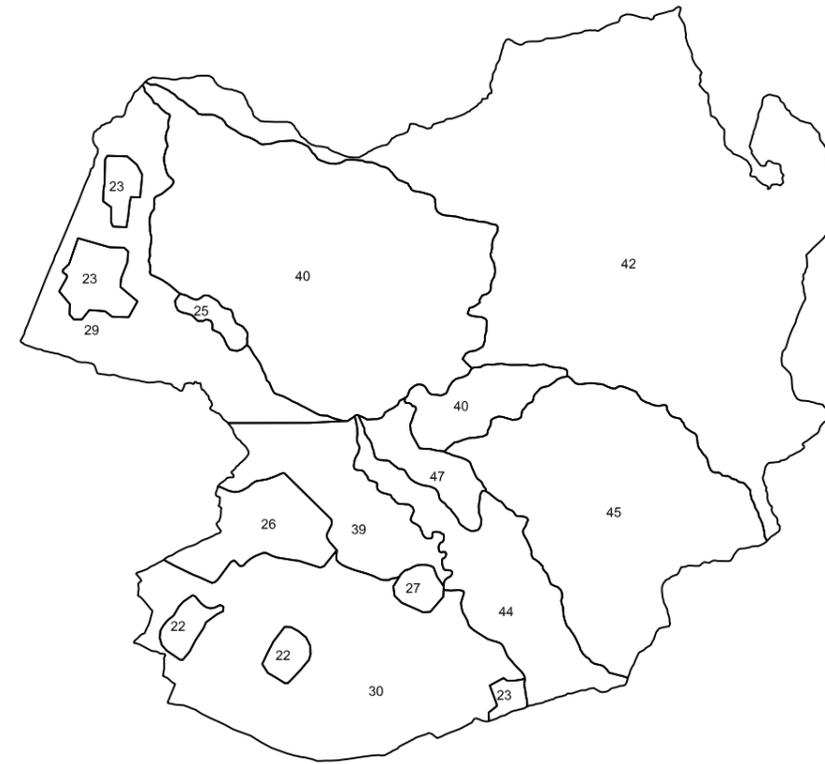
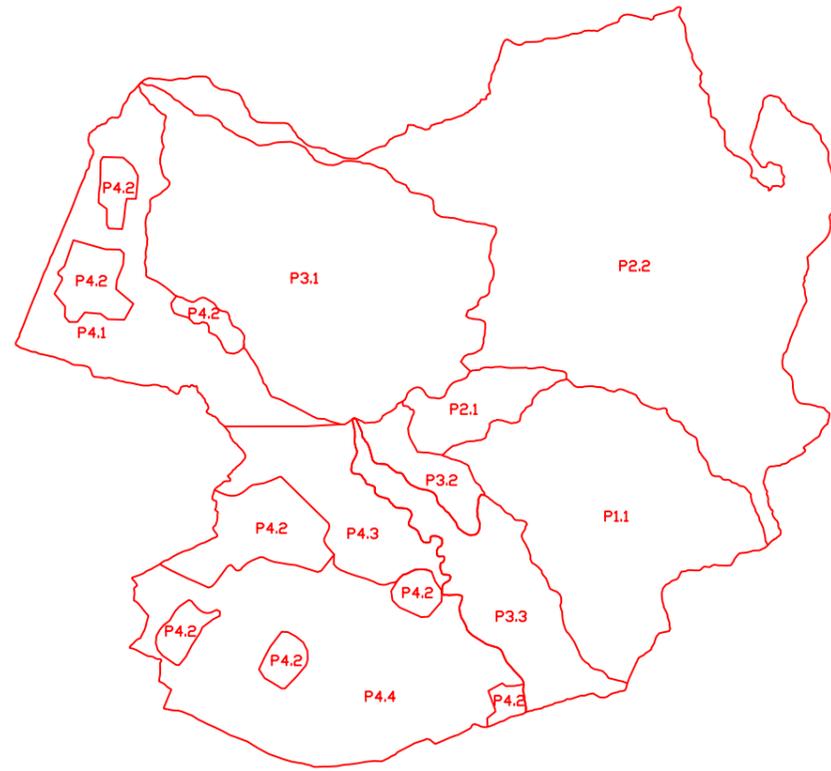
- **requalification of the existing tissue:** these are the areas behind the historic centre. In these areas, there must be a definition of a development/conservation strategy aimed at preserving the character and meaning of the historic urban landscape, in respect of the ancient city.

In these areas, the CDS/CCS envisage the requalification of the urban fabric, also present with the construction of new buildings;

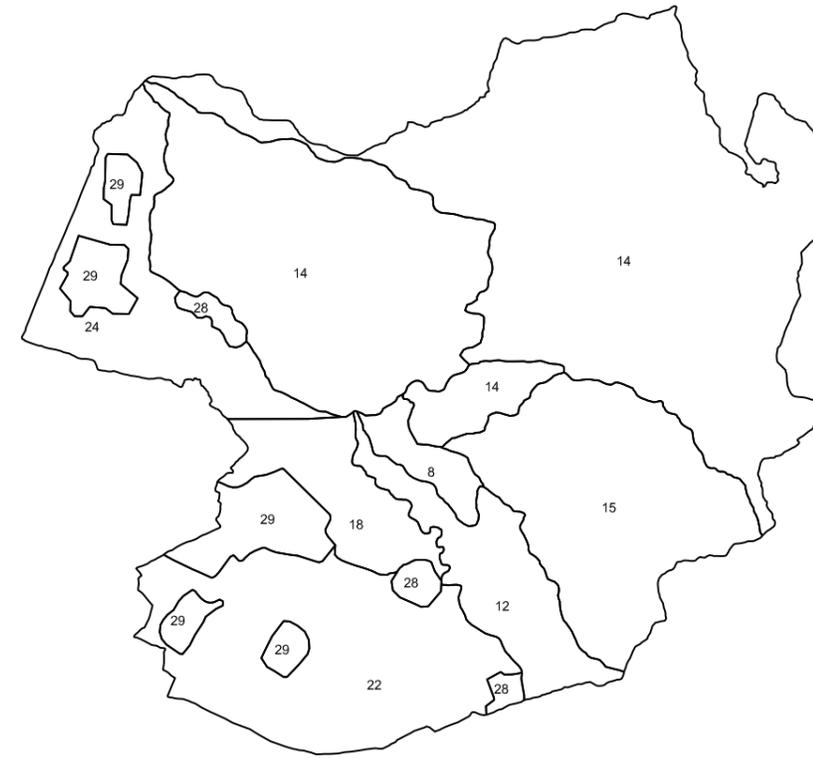
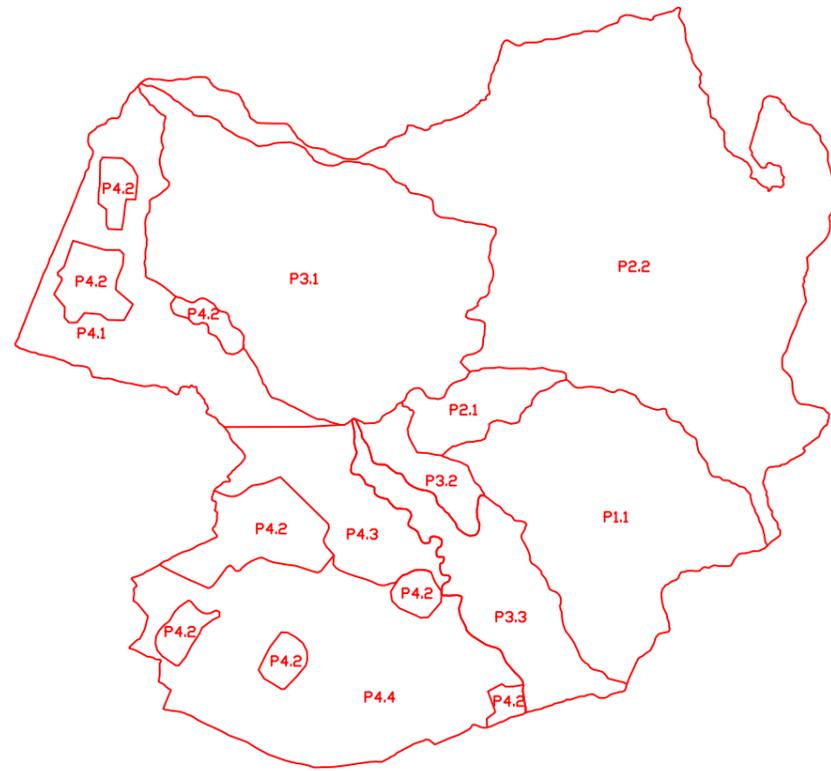
- **partially intact areas that require careful attention to planning, design and implementation:** these are vast areas of the Pianura Ferrarese that still retain partially intact original morphological characters;

- **the more vulnerable areas requiring careful attention paid to planning, design and implementation:** these are the areas that are not protected and lie outside the UNESCO perimeter, both core zone and buffer zone, which are not governed by protective instruments and precisely for this, it is here that future urban development actions must be carefully evaluated.





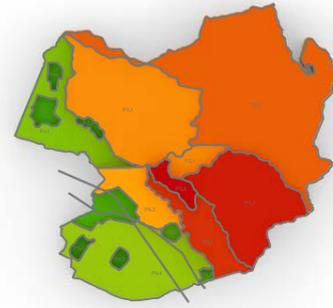
Area	WHL		protected areas		hist/cult resources		landscape resources		phys/nat resources		ecological resources		symbolical resources		socio-econ resources		tourism resources		visual integrity	
P1.1	Very High	5	High	4	High	4	Very High	5	Very High	5	Very High	5	High	4	High	4	High	4	Very High	5
P2.1	Very High	5	Medium	3	Medium	3	High	4	High	4	Very High	5	High	4	High	4	Medium	3	Very High	5
P2.2	Very High	5	Medium	3	Medium	3	High	4	Very High	5	Very High	5	High	4	High	4	High	4	Very High	5
P3.1	Very High	5	Medium	3	Medium	3	High	4	High	4	High	4	High	4	Very High	5	Medium	3	Very High	5
P3.2	Very High	5	Very High	5	Very High	5	Very High	5	High	4	Medium	3	Very High	5	Very High	5	Very High	5	Very High	5
P3.3	Very High	5	High	4	High	4	Very High	5	High	4	Medium	3	Very High	5	Very High	5	High	4	Very High	5
P4.1	High	4	Low	2	Low	2	Medium	3	Medium	3	High	4	Medium	3	Medium	3	Low	2	Medium	3
P4.2	<small>Torchigliana, Petrignano, Tordandrea, Castelnuovo</small> Medium	3	Negligible	1	Medium	3	Low	2	Medium	3	<small>Torchigliana, Petrignano, Palazzo</small> High	4	<small>S.Maria degli Angeli, Rivotorto</small> High	4	Medium	3	<small>S.Maria degli Angeli, Rivotorto</small> High	4	<small>Petrignano, Palazzo, Torchigliana, S.Maria degli Angeli</small> Negligible	1
P4.2	<small>Capodacqua, Rivotorto, S.Maria degli Angeli</small> High	4	Negligible	1	Medium	3	Low	2	Medium	3	<small>Castelnuovo, Tordandrea</small> Low	2	<small>Petrignano, Palazzo, Torchigliana, Capodacqua, Castelnuovo, Tordandrea</small> Negligible	1	Medium	3	<small>Petrignano, Palazzo, Torchigliana, Capodacqua, Castelnuovo, Tordandrea</small> Low	2	<small>Rivotorto, Tordandrea, Capodacqua, Castelnuovo</small> Low	2
P4.2	<small>Palazzo</small> Very High	5	Negligible	1	Medium	3	Low	2	Medium	3	<small>S.Maria degli Angeli, Capodacqua, Rivotorto</small> Negligible	1			Medium	3				
P4.3	High	4	Medium	3	High	4	High	4	High	4	High	4	High	4	Medium	3	High	4	Very High	5
P4.4	High	4	Negligible	1	Low	2	High	4	High	4	Medium	3	Medium	3	Medium	3	Medium	3	Medium	3



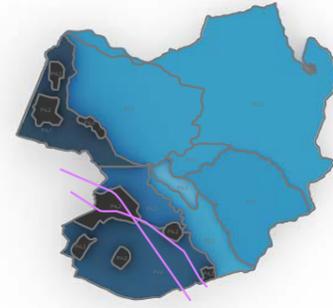
Area	hist/cult resources		landscape resources		phys/nat resources		ecological resources		symbolical resources		socio-econ resources		tourism resources	
P1.1	No Change	1	Negligible Change	2	Negligible Change	2	Minor Change	3	Negligible Change	2	No Change	1	Mod. Change	4
P2.1	No Change	1	Negligible Change	2	Negligible Change	2	Minor Change	3	Negligible Change	2	Negligible Change	2	Negligible Change	2
P2.2	No Change	1	Negligible Change	2	Negligible Change	2	Minor Change	3	Negligible Change	2	Negligible Change	2	Negligible Change	2
P3.1	No Change	1	Negligible Change	2	Negligible Change	2	Minor Change	3	Negligible Change	2	Negligible Change	2	Negligible Change	2
P3.2	No Change	1	No Change	1	No Change	1	No Change	1	No Change	1	No Change	1	Negligible Change	2
P3.3	No Change	1	Negligible Change	2	Negligible Change	2	Negligible Change	2	No Change	1	Negligible Change	2	Negligible Change	2
P4.1	Minor Change	3	Mod. Change	4	Mod. Change	4	Mod. Change	4	Minor Change	3	Mod. Change	4	Negligible Change	2
P4.2	Major Change	5	Major Change	5	Mod. Change	4	Mod. Change	4	Major Change	5	Mod. Change	4	Negligible Change	2
P4.3	Negligible Change	2	Negligible Change	2	Negligible Change	2	Mod. Change	4	Negligible Change	2	Mod. Change	4	Negligible Change	2
P4.4	Negligible Change	2	Mod. Change	4	Mod. Change	4	Mod. Change	4	Negligible Change	2	Mod. Change	4	Negligible Change	2



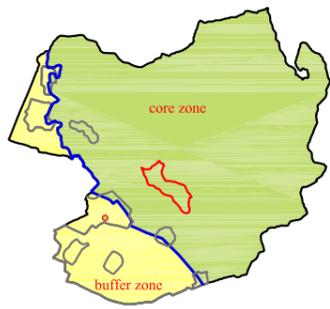
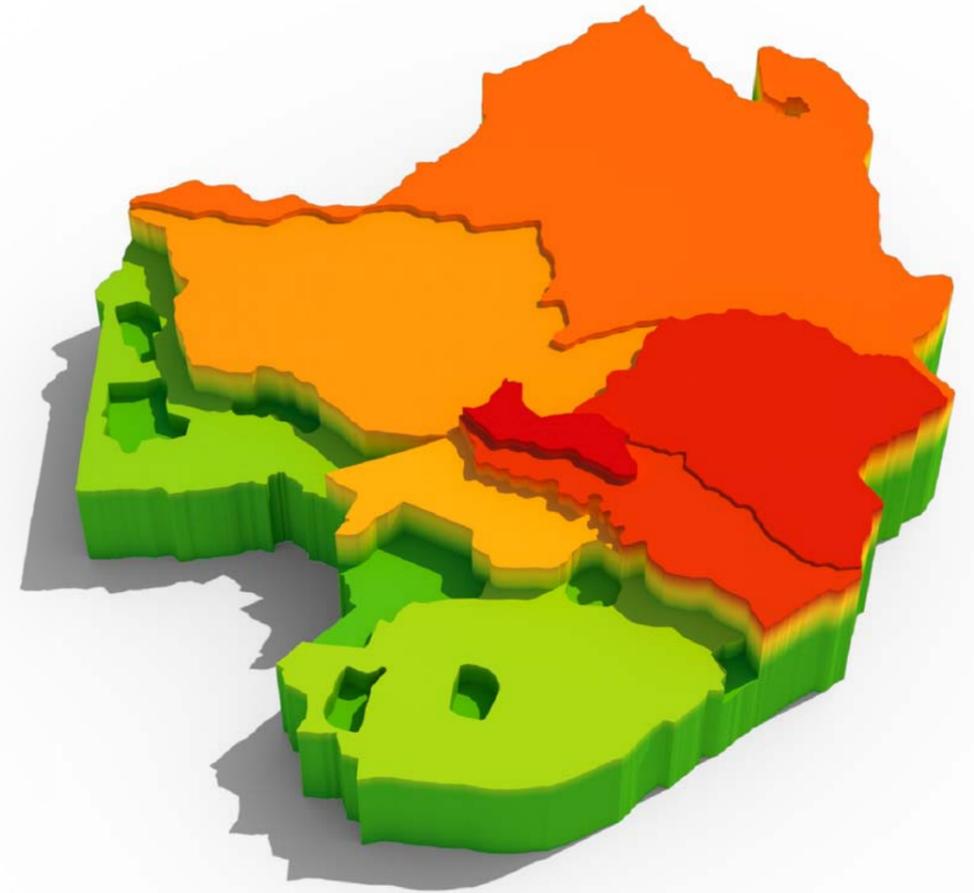
Homogeneous areas



Intensity map



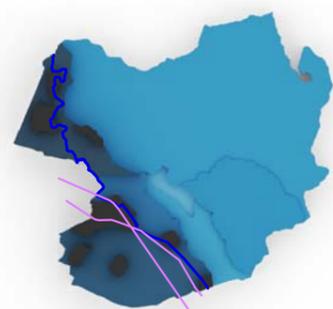
Vulnerability map



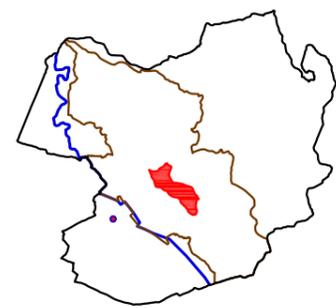
UNESCO site



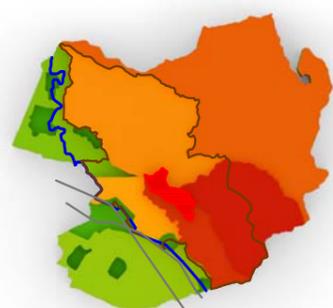
Intensity map



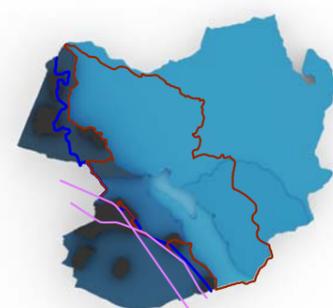
Vulnerability map



- APS "Grandi panorami"
- UNESCO core zone (border)
- Assisi historic centre
- Porziuncola

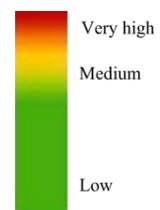


Intensity map

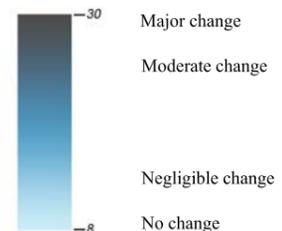


Vulnerability map

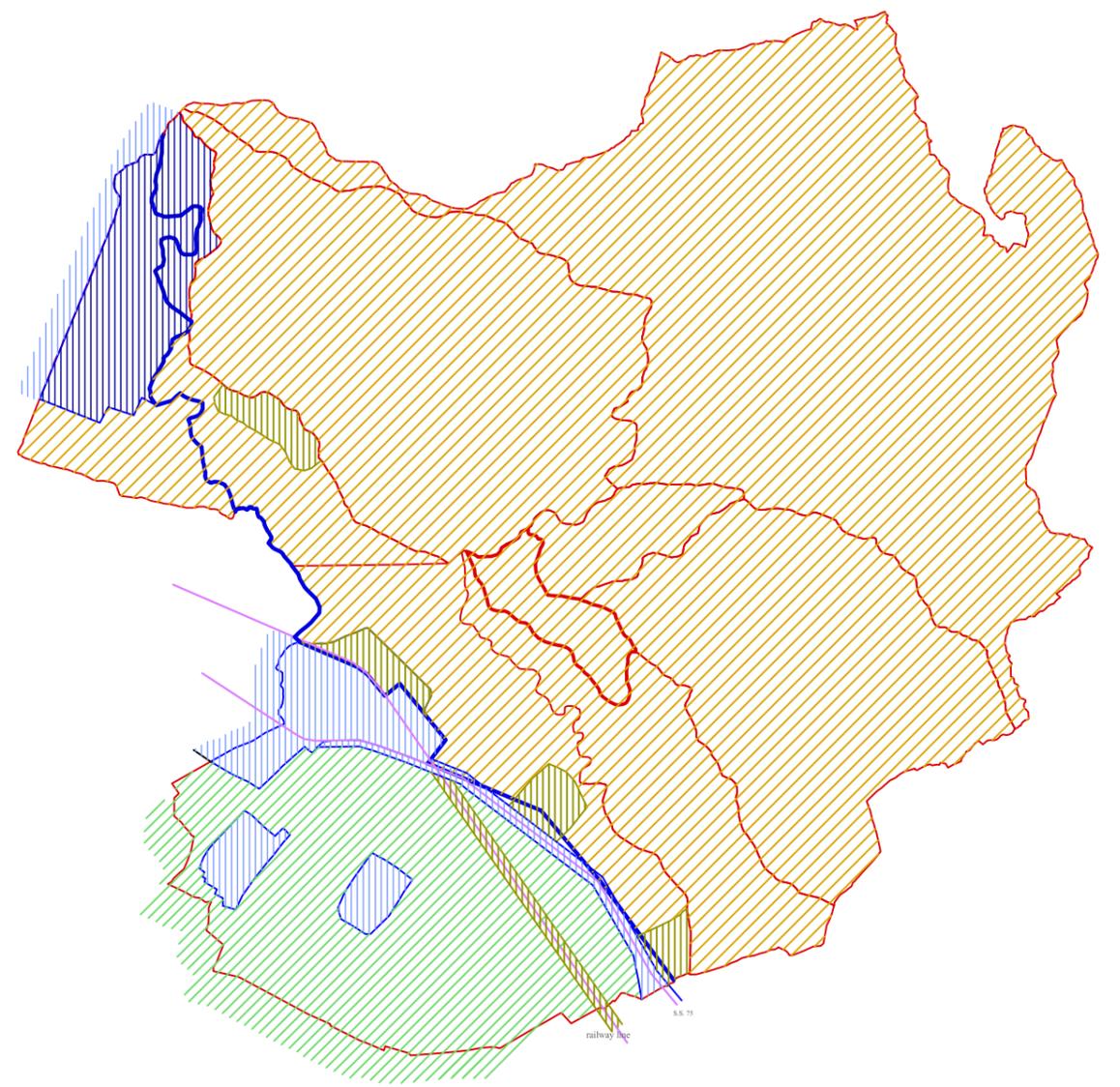
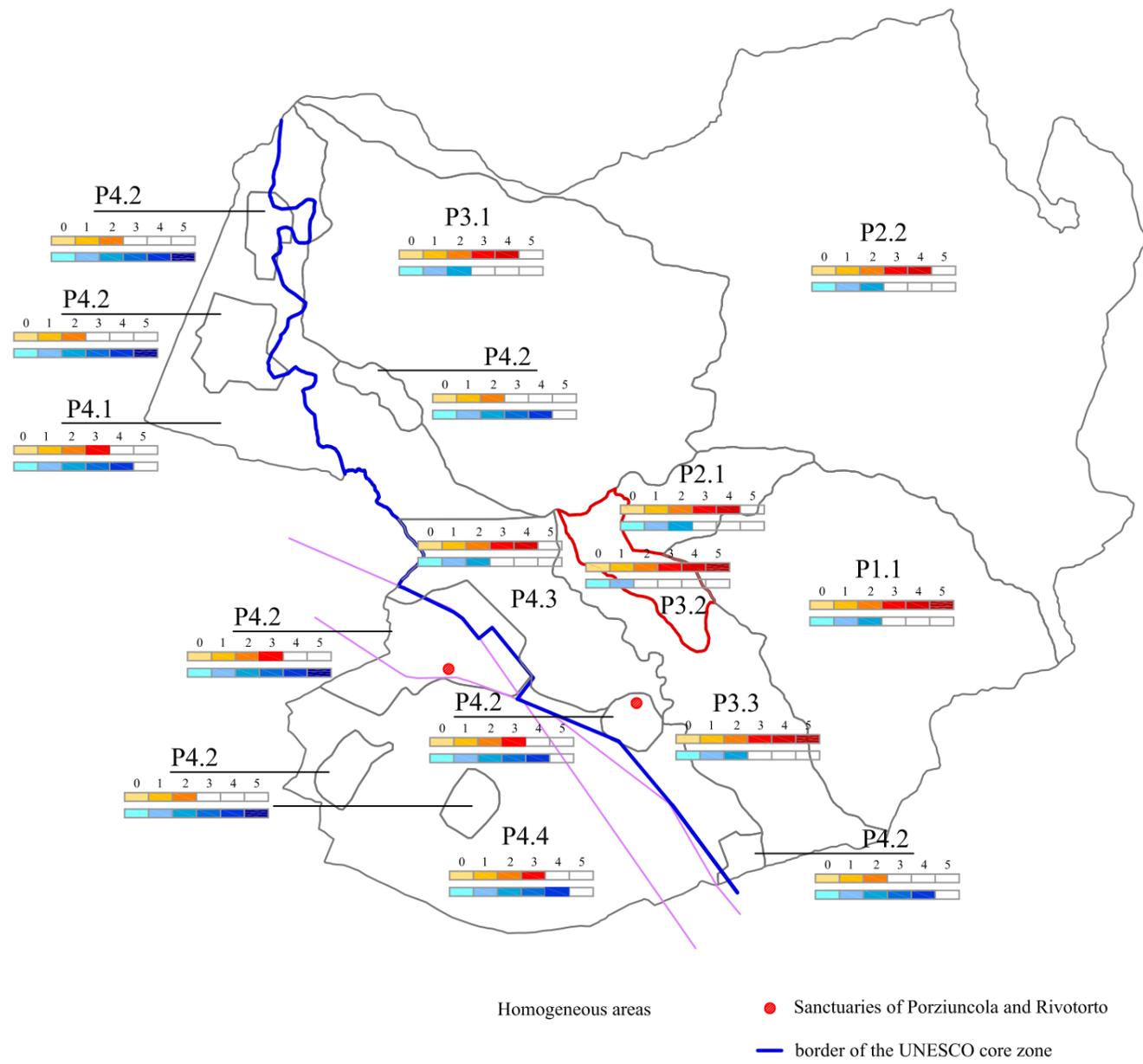
IMPORTANCE OF THE RESOURCES



VULNERABILITY / POSSIBILITY OF CHANGE

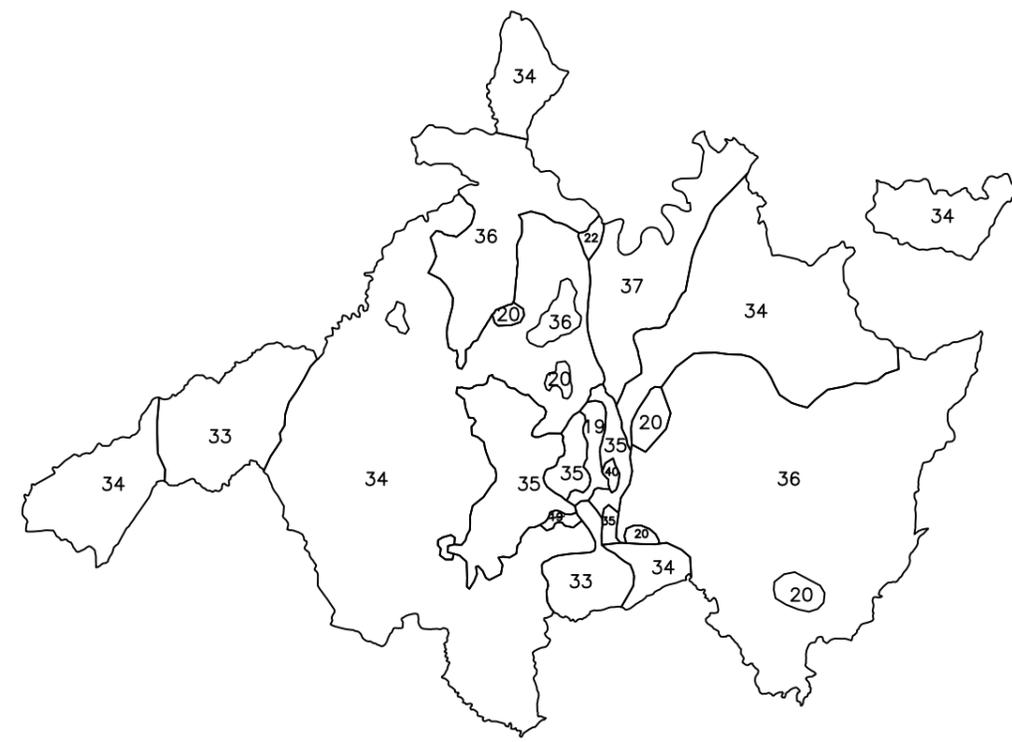
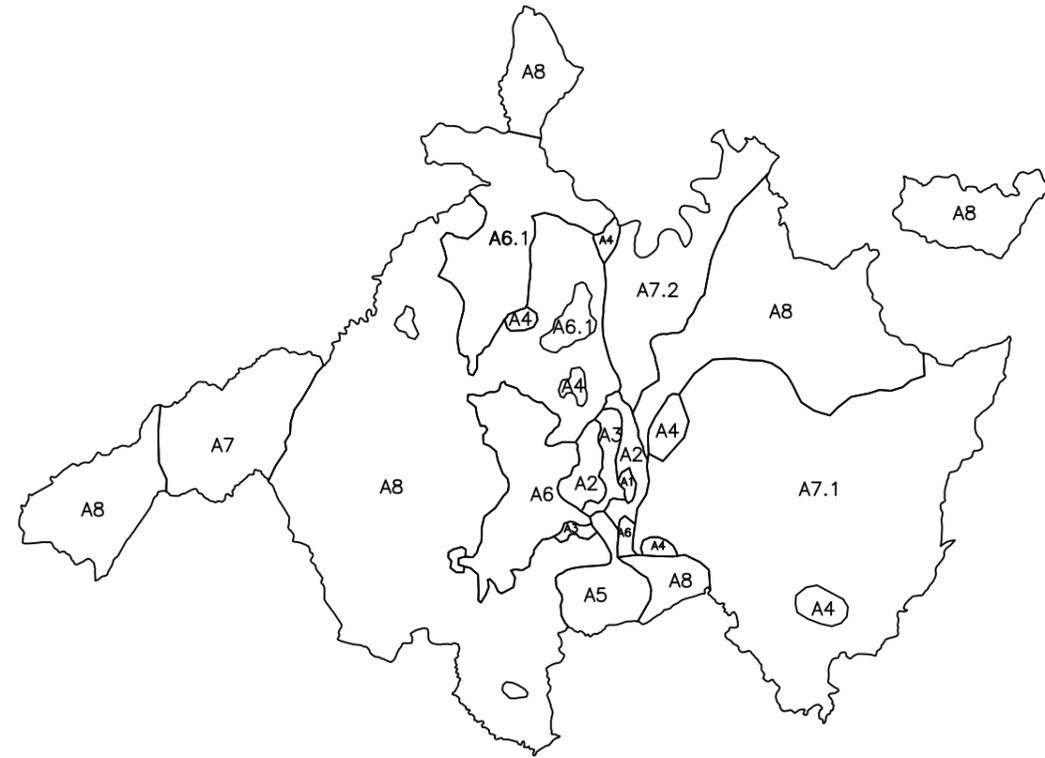


Intensity and Vulnerability models

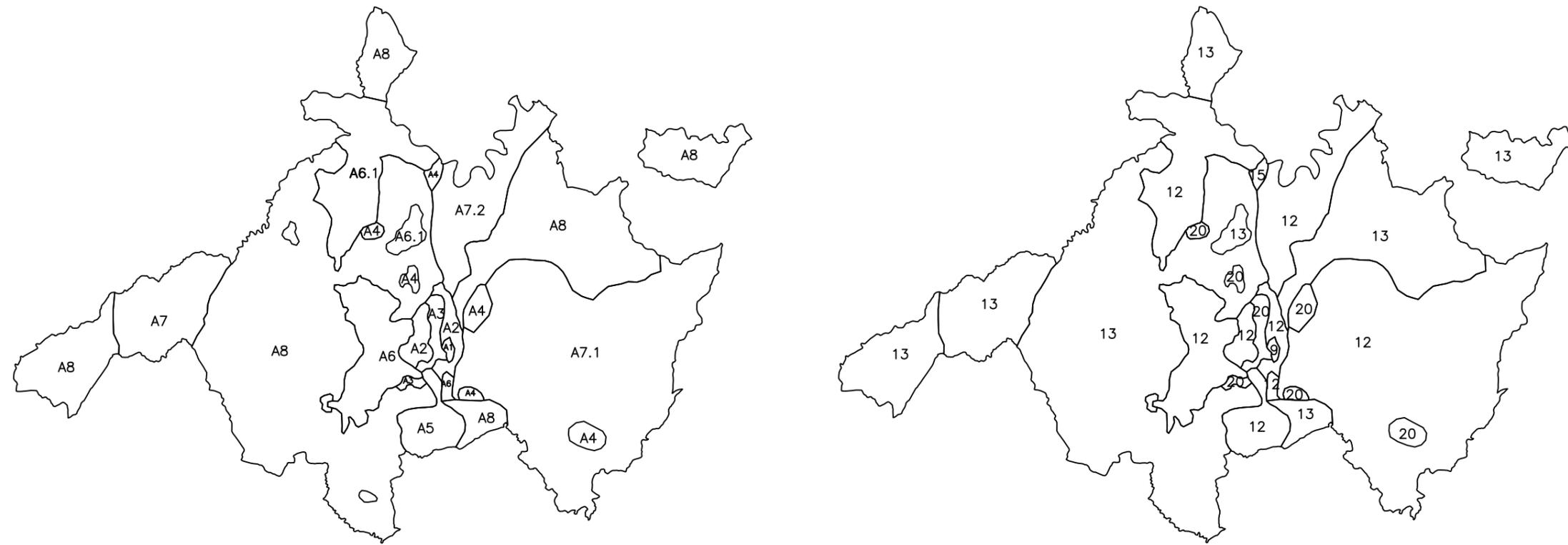


Intensity of the resources		Vulnerability	
0 1 2 3 4 5	Very High	0 1 2 3 4 5	No change
0 1 2 3 4 5	High	0 1 2 3 4 5	Negligible change
0 1 2 3 4 5	Medium	0 1 2 3 4 5	Minor change
0 1 2 3 4 5	Low	0 1 2 3 4 5	Moderate change
0 1 2 3 4 5	Negligible	0 1 2 3 4 5	Major change
0 1 2 3 4 5	Unknown		

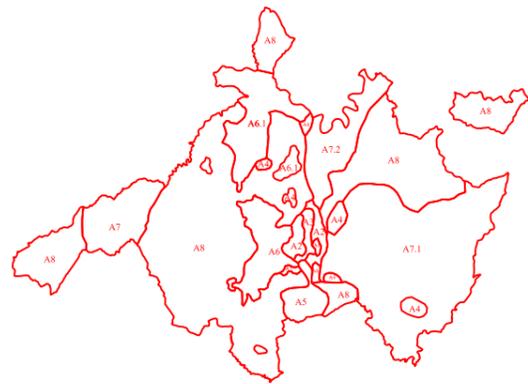
-  strictly no-go areas
-  opportunities for development
-  opportunities for development, in particular for the construction of high buildings
-  already compromised areas that require attention to planning, design and implementation
-  partially intact areas that require careful attention to planning, design and implementation
-  border of the UNESCO core zone
-  Assisi historic centre



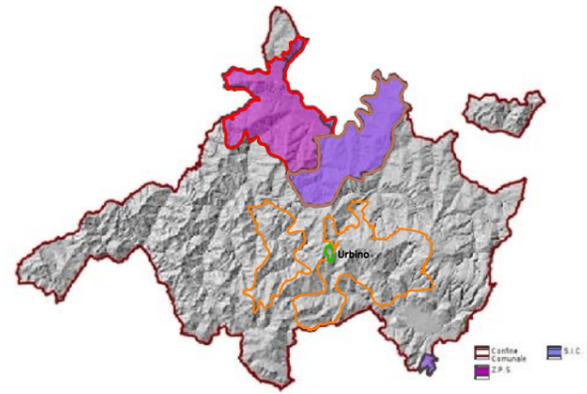
Area	WHL	protected areas	SIC-ZPS	hydrological system	landscape resources	ecosystems	botanical resources	historical resources	land use	visual integrity										
A1	Very High	5	High	4	Negligible	1	High	4	Very High	5	Medium	3	High	4	Very High	5	High	4	Very High	5
A2	Medium	3	Very High	5	Negligible	1	High	4	Very High	5	Medium	3	High	4	Medium	3	Medium	3	High	4
A3	Low	2	Medium	3	Negligible	1	Low	2	Low	2	Low	2	Low	2	Low	2	Low	2	Negligible	1
A4	Low	2	Low	2	Medium	3	Low	2	Low	2	Low	2	Low	2	Low	2	Low	2	Negligible	1
A5	Medium	3	Very High	5	Negligible	1	Medium	3	High	4	High	4	High	4	Low	2	High	4	Medium	3
A6	Medium	3	Very High	5	Negligible	1	High	4	High	4	High	4	High	4	Low	2	High	4	High	4
A6.1	Negligible	1	Very High	5	High	4	High	4	High	4	High	4	High	4	Low	2	High	4	High	4
A7	Negligible	1	Very High	5	Negligible	1	High	4	High	4	High	4	High	4	Low	2	High	4	High	4
A7.1	Low	2	Very High	5	Negligible	1	High	4	Very High	5	Very High	5	High	4	Low	2	High	4	High	4
A7.2	Negligible	1	High	4	Very High	5	High	4	Very High	5	High	4	High	4	Low	2	High	4	High	4
A8	Negligible	1	High	4	Medium	3	High	4	High	4	High	4	High	4	Low	2	High	4	High	4



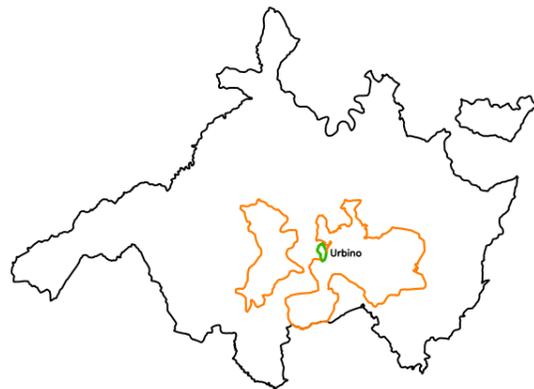
Area	hydrological system	landscape resources	ecosystems	botanical resources	historical resources	land use
A1	Negligible Change 2	No Change 1	Negligible Change 2	Negligible Change 2	No Change 1	No Change 1
A2	Negligible Change 2	Negligible Change 2				
A3	Minor Change 3	Mod. Change 4	Mod. Change 4	Minor Change 3	Minor Change 3	Minor Change 3
A4	Minor Change 3	Mod. Change 4	Mod. Change 4	Minor Change 3	Minor Change 3	Minor Change 3
A5	Negligible Change 2	Negligible Change 2				
A6	Negligible Change 2	Negligible Change 2				
A6.1	Negligible Change 2	Negligible Change 2				
A7	Negligible Change 2	Minor Change 3				
A7.1	Negligible Change 2	Negligible Change 2				
A7.2	Negligible Change 2	Negligible Change 2				
A8	Negligible Change 2	Minor Change 3				



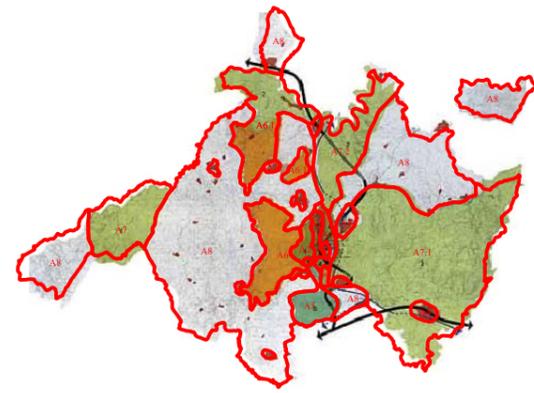
Homogeneous areas



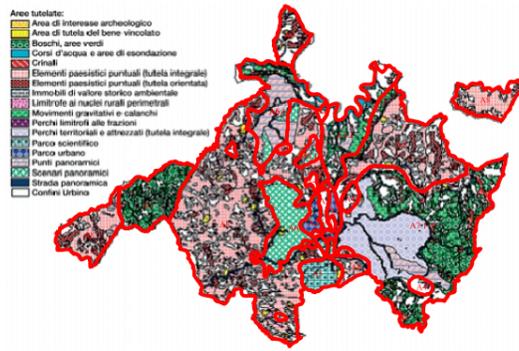
SIC Areas



UNESCO site



Protected areas

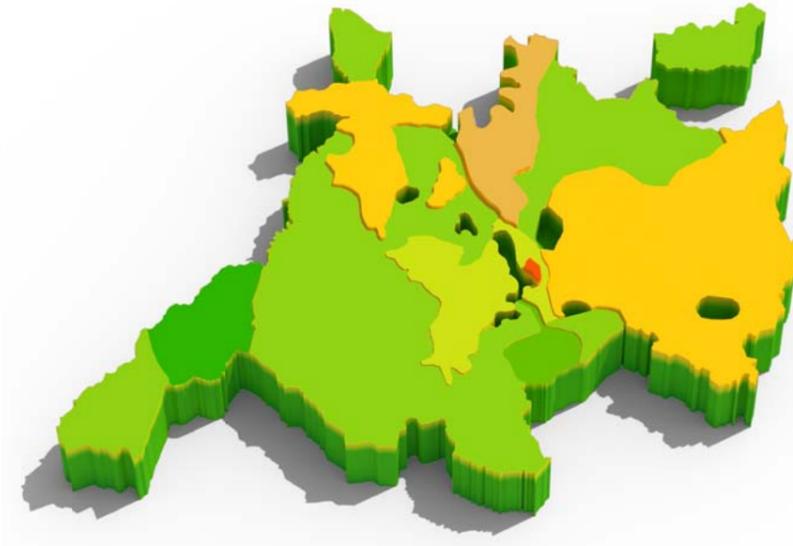


- Area tutelata:
- Area di interesse archeologico
- Area di tutela del bene vincolato
- Boschi, aree verdi
- Corsi d'acqua e aree di esondazione
- Crinali
- Elementi paesistici puntuali (tutela integrale)
- Elementi paesistici puntuali (tutela orientata)
- Immobili di valore storico ambientale
- Limite di nuclei rurali geomorfologici
- Movimenti gravitativi e calanchi
- Parchi limitrofi alle trazioni
- Parchi territoriali e attrezzati (tutela integrale)
- Parco scientifico
- Parco urbano
- Punti panoramici
- Scandoli panoramici
- Strada panoramica
- Contorni Urbino

- Buffer zone
- UNESCO core zone
- hamlets



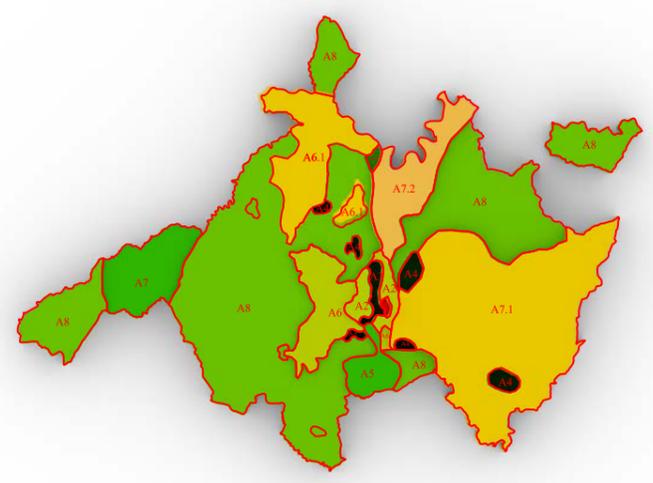
Protected areas



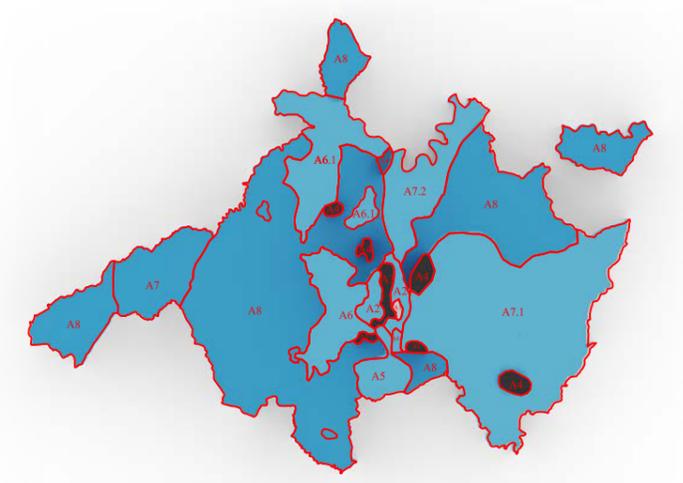
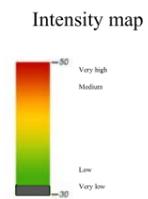
Intensity model



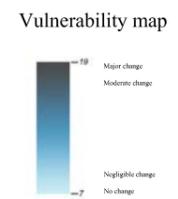
Vulnerability model



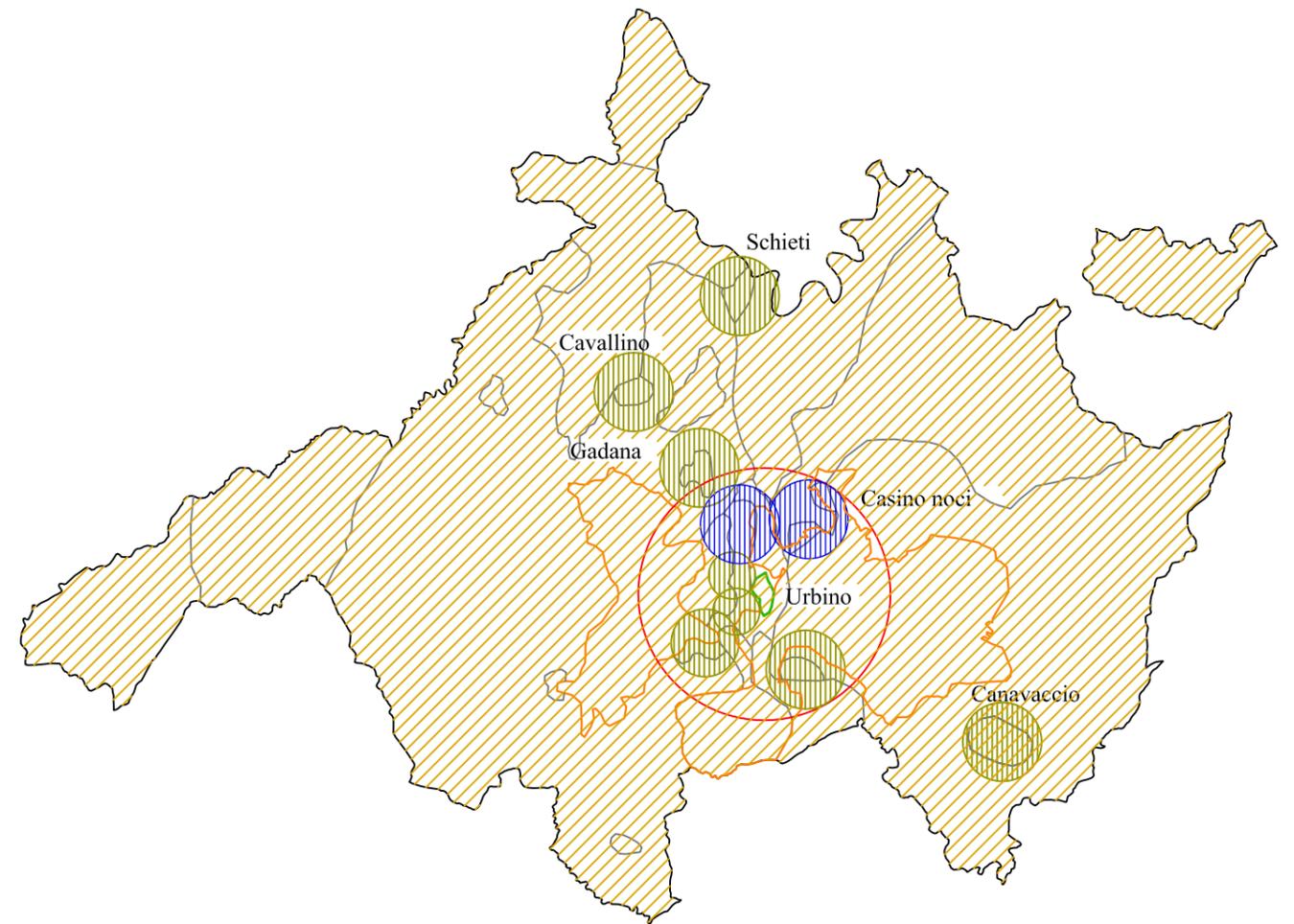
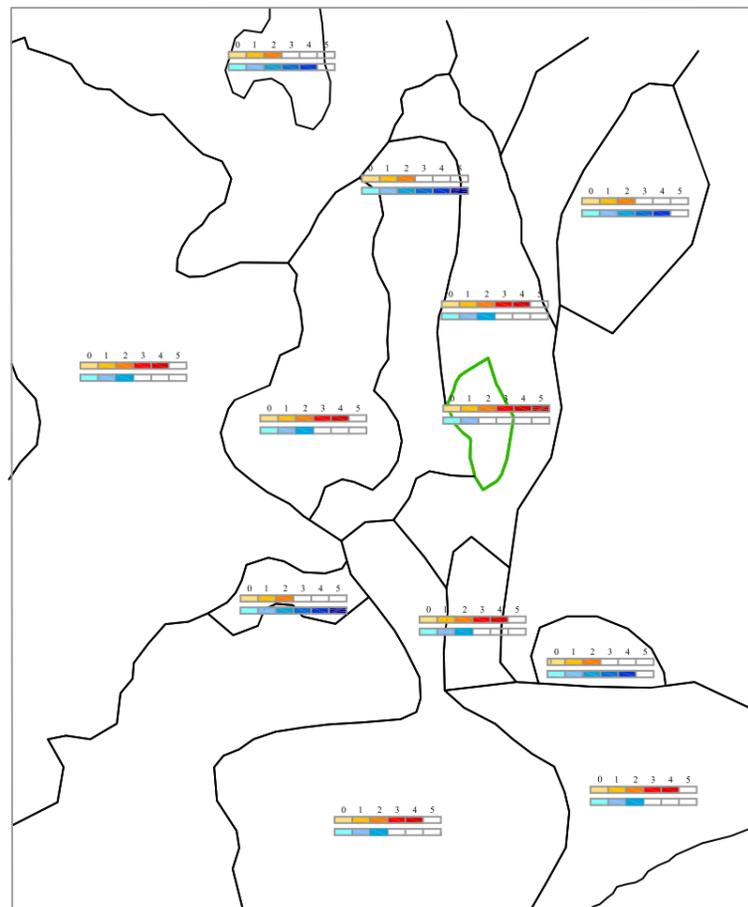
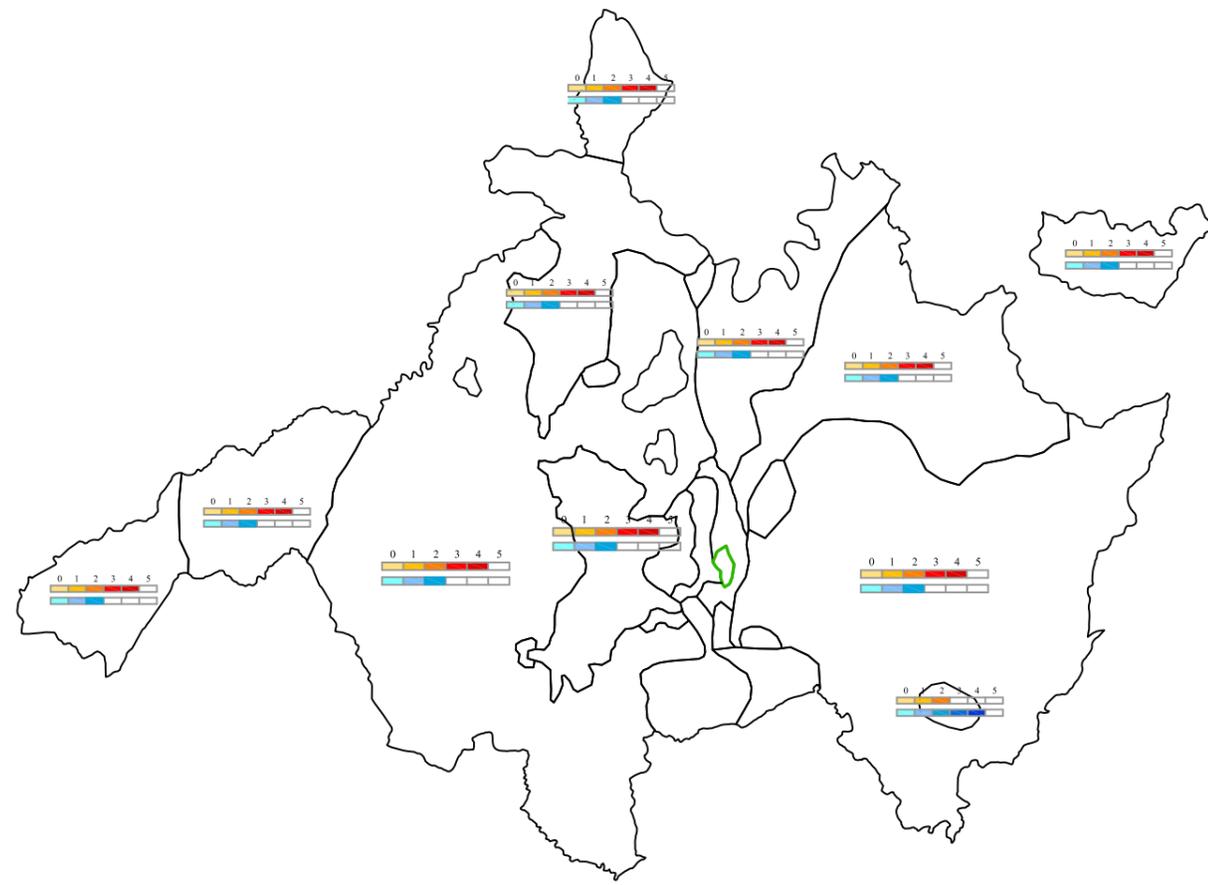
Intensity map



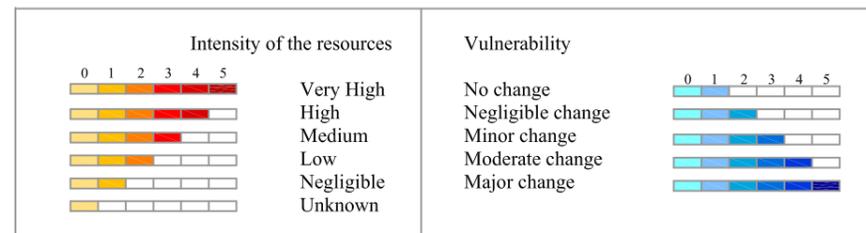
Vulnerability map

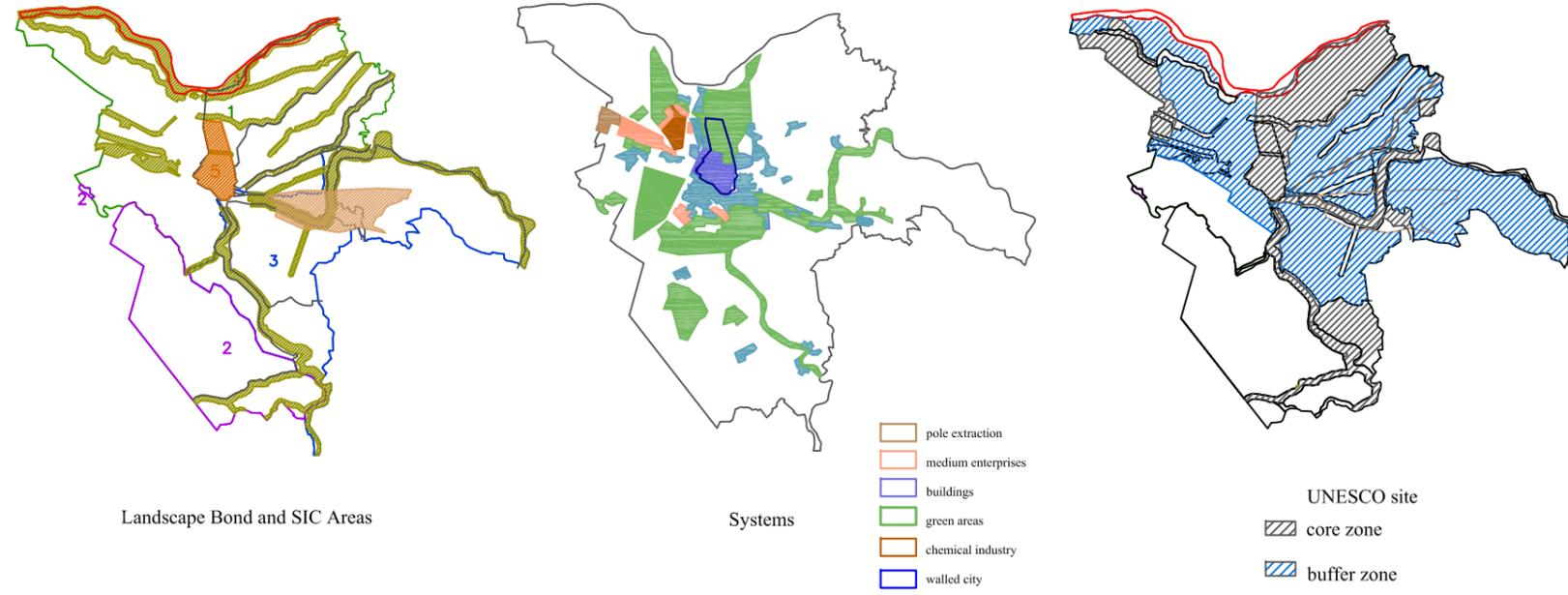


Methodological approach to the conservation of HUL: the case of Urbino
 Definition of City Development Strategy (CDS)/City Conservation Strategy (CCS)



-  strictly no-go areas
-  already compromised areas in which are present high buildings opportunities for development, in particular for the construction of high buildings
-  already compromised areas that require attention to planning, design and implementation (hamlets)
-  border of the UNESCO Core zone
-  Buffer zone





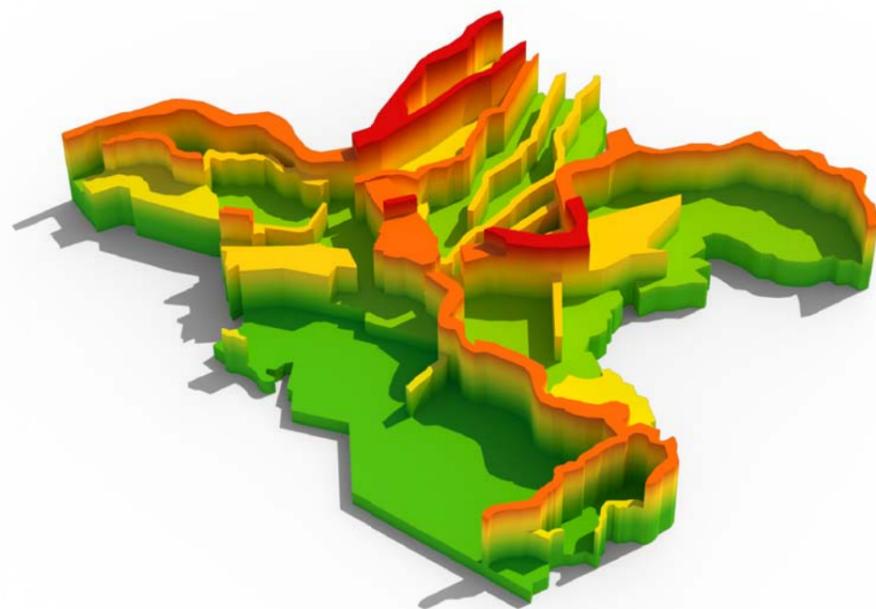
Landscape Bond and SIC Areas

Systems

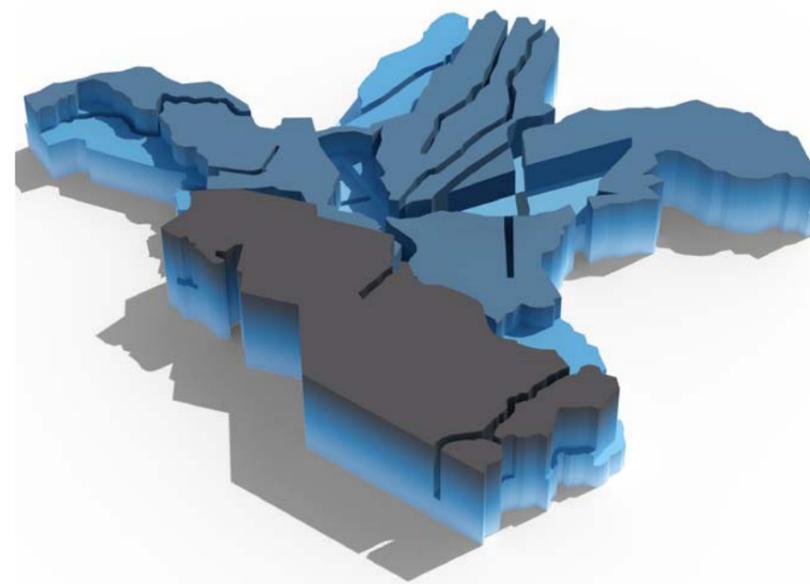
UNESCO site



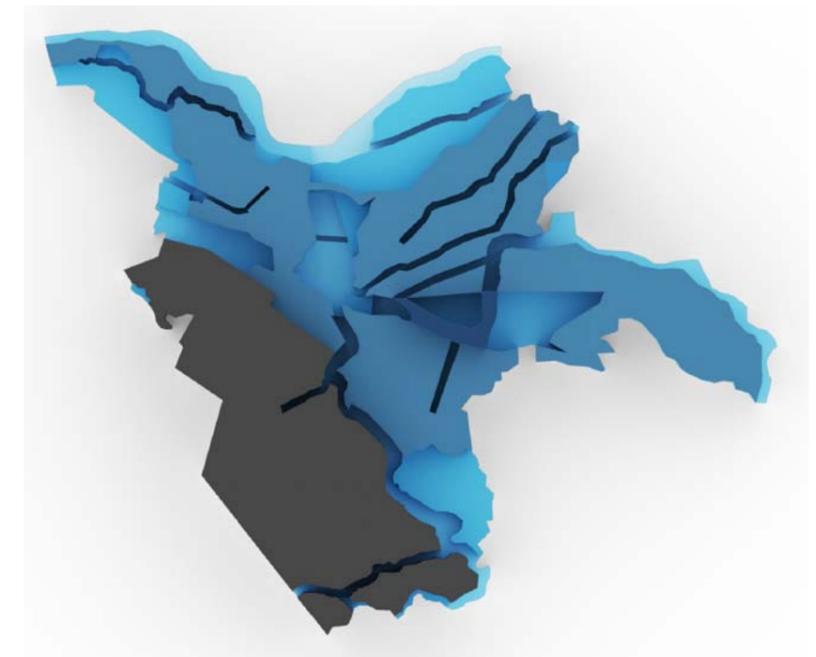
Intensity map



Intensity model

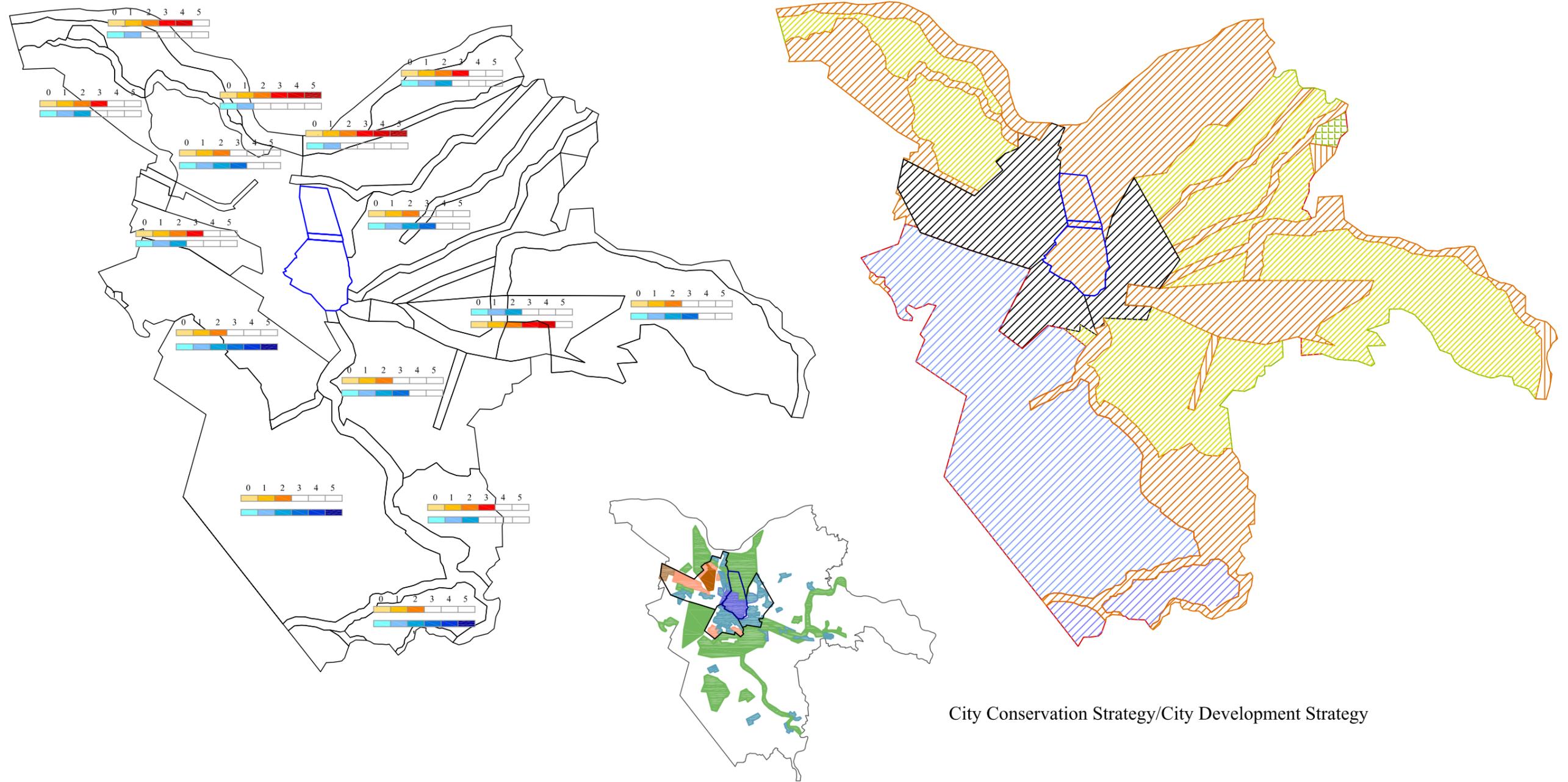


Vulnerability model



Vulnerability map

Methodological approach to the conservation of HUL: the case of Ferrara
 Definition of City Development Strategy (CDS)/City Conservation Strategy (CCS)

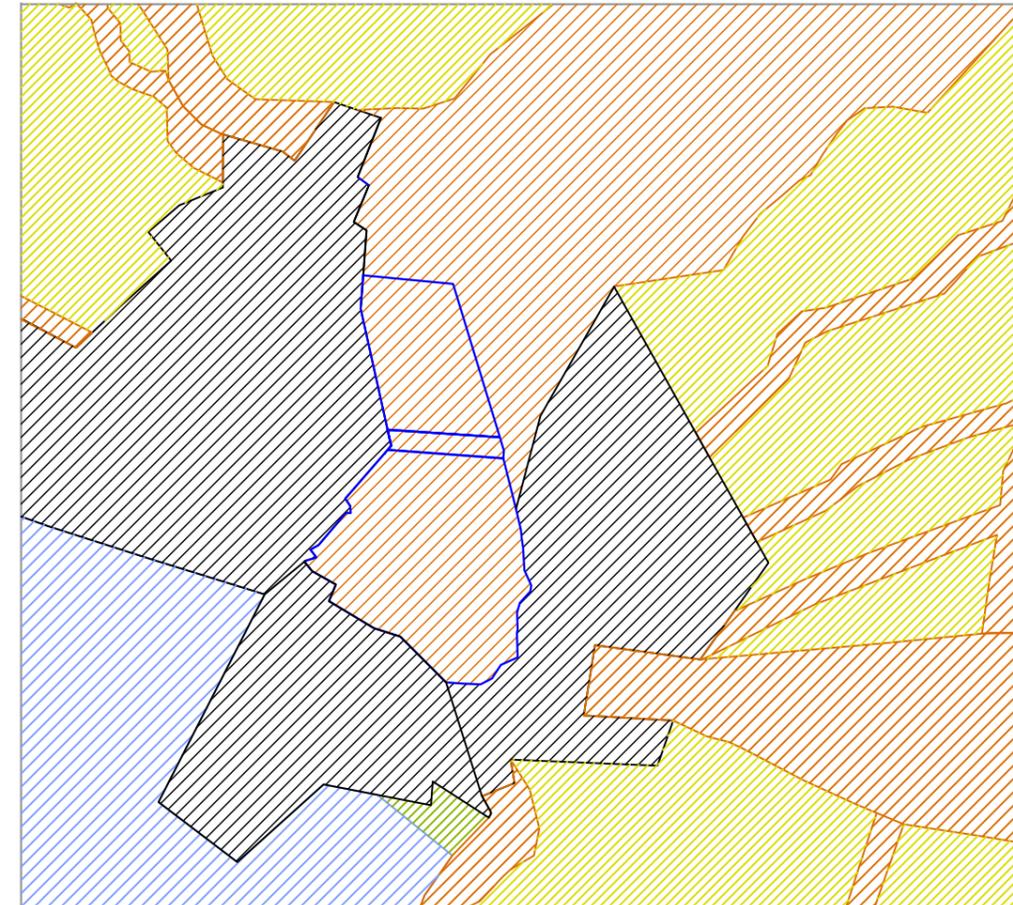
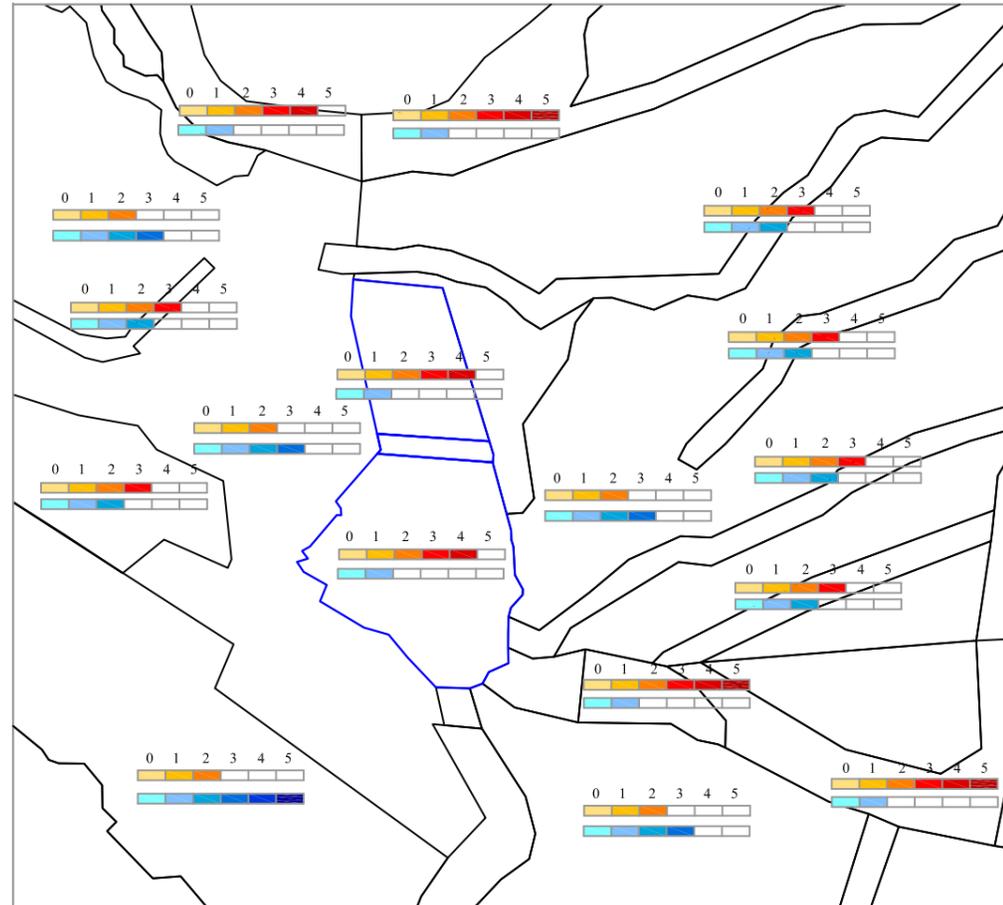


Intensity of the resources		Vulnerability	
0 1 2 3 4 5	Very High	0 1 2 3 4 5	No change
0 1 2 3 4 5	High	0 1 2 3 4 5	Negligible change
0 1 2 3 4 5	Medium	0 1 2 3 4 5	Minor change
0 1 2 3 4 5	Low	0 1 2 3 4 5	Moderate change
0 1 2 3 4 5	Negligible	0 1 2 3 4 5	Major change
0 1 2 3 4 5	Unknown		

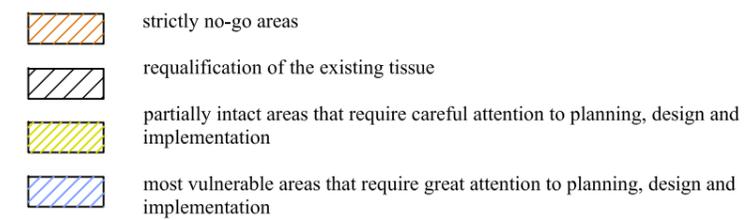
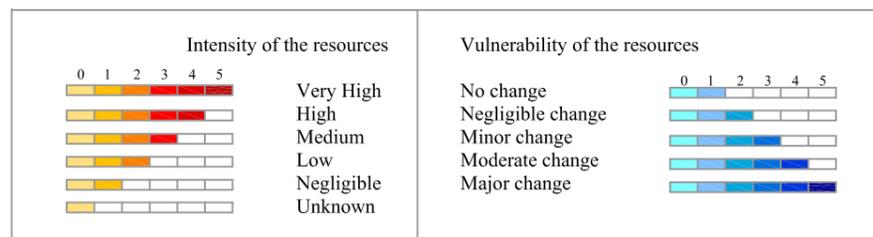
- Systems
- pole extraction
 - medium enterprises
 - buildings
 - green areas
 - chemical industry
 - walled city

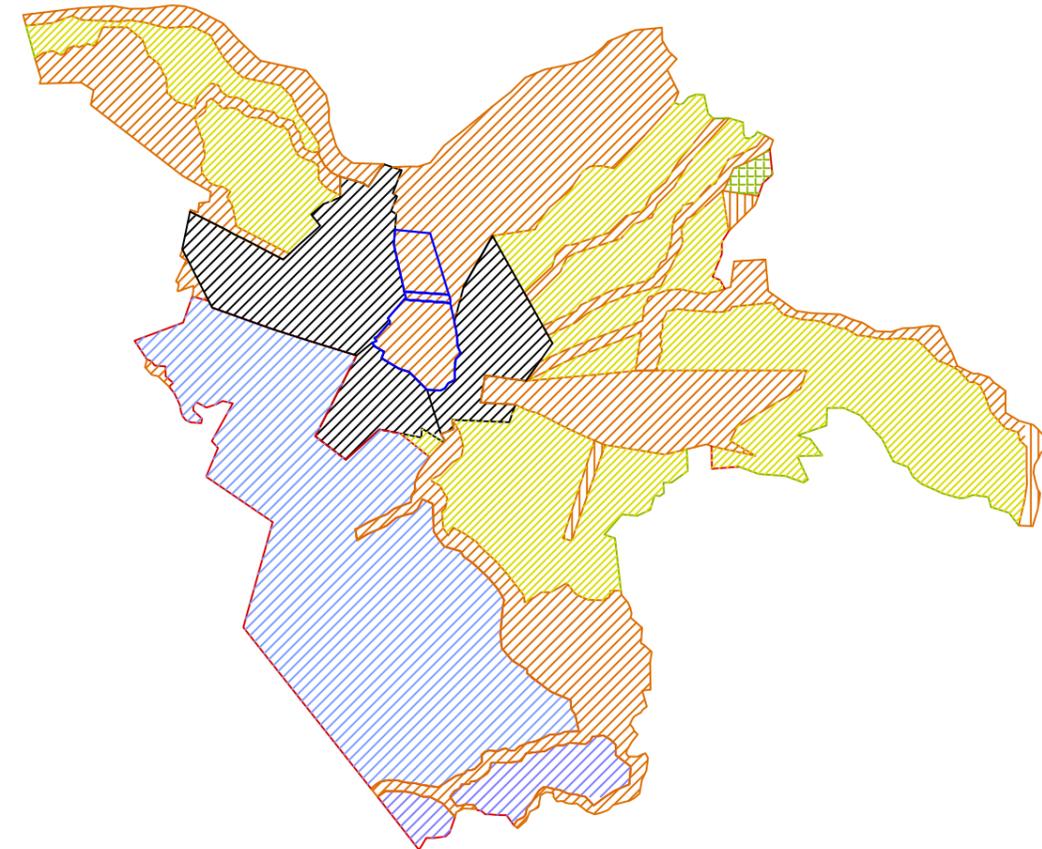
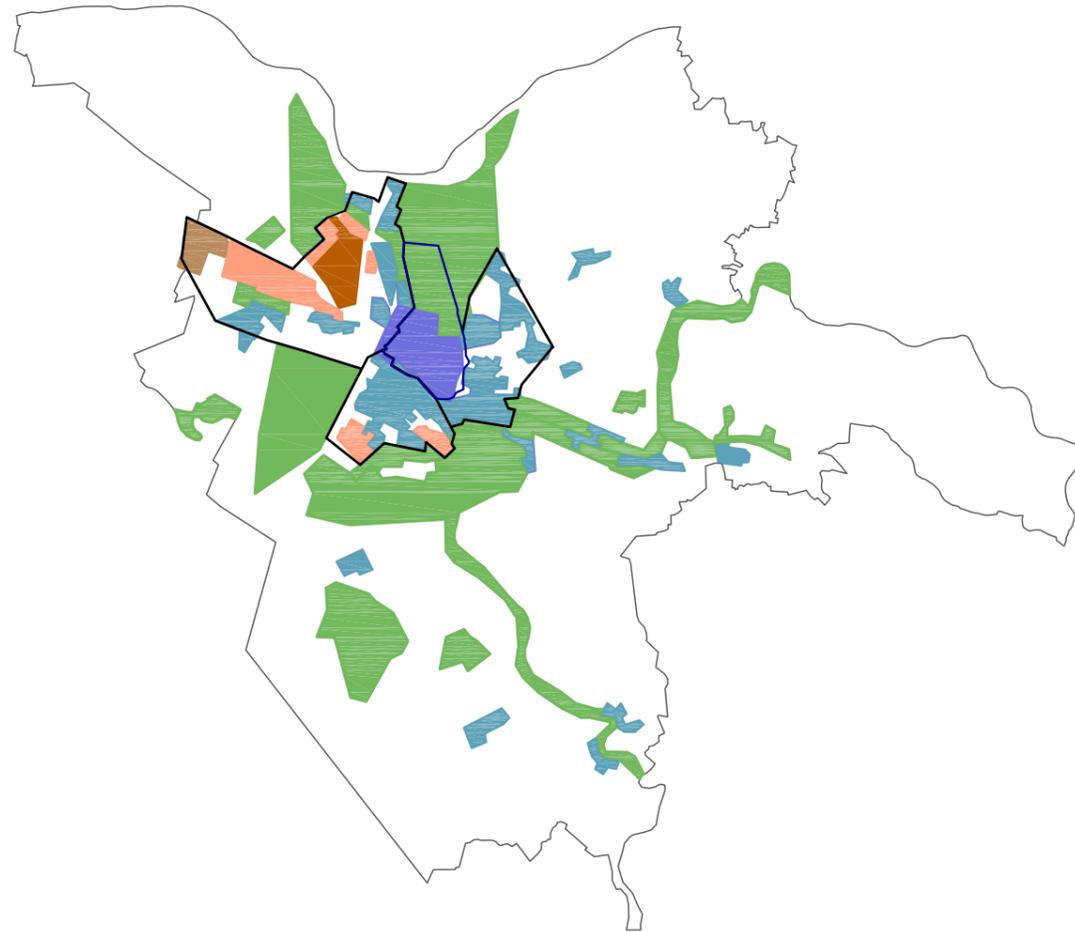
City Conservation Strategy/City Development Strategy

- strictly no-go areas
- equalization of the existing tissue
- partially intact areas that require careful attention to planning, design and implementation
- most vulnerable areas that require great attention to planning, design and implementation



City Conservation Strategy/City Development Strategy





Systems

-  pole extraction
-  medium enterprises
-  buildings
-  green areas
-  chemical industry
-  walled city

-  strictly no-go areas
-  requalification of the existing tissue
-  partially intact areas that require careful attention to planning, design and implementation
-  most vulnerable areas that require great attention to planning, design and implementation

REFERENCES

Assisi

- 2011 General Plan of Assisi

<http://www.comune.assisi.pg.it/piano-regolatore-generale/>

DCC n.96 "Adozione del nuovo Piano Regolatore Generale del Comune di Assisi, parte strutturale, e del Piano di gestione del sito UNESCO".

- 2011 Management Plan

<http://www.comune.assisi.pg.it/piano-di-gestione-del-sito-unesco-di-assisi/>

DCC n.96 "Adozione del nuovo Piano Regolatore Generale del Comune di Assisi, parte strutturale, e del Piano di Gestione del sito UNESCO".

- 2011 Linee Guida per la qualità del paesaggio di Assisi

<http://www.comune.assisi.pg.it/piano-regolatore-generale/>

- 1958 Assisi General Plan

IUAV, Archival Projects

Urbanistica nr. 24-25, 1958

- 1966 Assisi General Plan

IUAV, Archival Projects

- Perugia General Plan

<http://www.comune.perugia.it/canale.asp?id=5865>

- Bettona General Plan

<http://www.comune.bettona.pg.it/>

- Bastia Umbra General Plan

www.comune.bastia.pg.it/

- IUAV Archival Projects ("Astengo Fund")

- for the definition of the intensity of resources/possibility for change: 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties

Urbino

- 1994 Urbino General Plan (hard copy)

- 1964 Urbino General Plan (hard copy)

- PTC Region Marche

<http://www.ambiente.regione.marche.it/Territorio/Paesaggio/PPARPianoPaesistico>

AmbientaleRegionale.aspx

- PTCP Province of Pesaro-Urbino

<http://www.provincia.pu.it/urbanistica/pianificazione-terre-via-beni-paesistico-ambientali/pianificazione-terre-ptc/piano-territoriale-di-coordinamento-vigente/>

- IUAV Archival Projects ("Giancarlo De Carlo Fund")

- internet sources

- for the definition of the intensity of resources/possibility for change: 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties

Ferrara

- 2009 Ferrara General Plan <http://urbanistica.comune.fe.it/index.phtml?id=67>

- PTR Region of Emilia Romagna

<http://www.regione.emilia-romagna.it/temi/territorio/territorio/vedi-anche/piano-territoriale-regionale-ptr>

- PTCP Province of Ferrara

<http://www.provincia.fe.it/Distribuzione/ptcp/Approvati/PTCP/html/indice.htm>

- internet sources

- 2009 Ferrara, City of the Renaissance and its Po Delta Management Plan

- General Plan "Unione dei Comuni Terre e Fiumi (Comuni di Copparo, Berra, Formignana, Jolanda di Savoia, Tresigallo and Ro) .

http://www.unioneterrefiumi.fe.it/nqcontent.cfm?a_id=1437

- Associated Municipal Structural Plan of Argenta.Migliarino-Ostellato-Portomaggiore-Voghiera

http://www.comune.argenta.fe.it/psc/psc_associato_index.aspx

- Associated Municipal Structural Plan of Bondeno, Cento, Mirabello, Poggio Renatico, Sant'Agostino, Vigarano Mainarda

<http://www.comune.cento.fe.it/>

- Le Delizie Estensi

www.castelloestense.it/delizie/

- for the definition of the intensity of resources/possibility for change: 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties.

20. ASPECTS OF HISTORIC URBAN LANDSCAPE IN ASSISI, URBINO, FERRARA: REFLECTIONS AND COMPARISONS

20.1. Introduction

“Universally acknowledged and rightly considered as one of the richest centres of evidence of history, art, environmental and landscape values, Assisi, finding itself included in the first list of one hundred municipalities obliged to prepare the plan, appeared to be one of the most sought-after parties for the study of a town planner.

[...] It was the extraordinary, multiform and contradictory aspects of the subject that kindled an awareness driven by the tiniest physical and human factors and stimulated a fitting method of investigation and planning; and that it was precisely this need for specific identification, in a scope that already looked indeed had been minutely identified, to ask that design should not cease at the generic, simplified indication of the local plan, but rather define and concretely characterise the individual interventions.”¹

“Urbino appears differently depending on whether it is observed from within or in tangency from the nearby outside and from the far-off outside; and this difference in perception that presents the multiplication of aspects that end up becoming a single, extremely broad image.

I have sought to upturn a practice that appeared to be standard in Italian town planning and perhaps in much of Italian culture, of always discussing in “generic terms”, with the promise declared but rarely implemented or taking a look at “specific cases”.

[...] The immediate aim was to finalise a town planning programme of use to Urbino; the more distant aim was to provide indications that could have a more general meaning, regardless of the case considered.”²

“This study on Ferrara presented itself as a “pilot” project, precisely because it sought to define methods of integration and implementation and management tools that enabled development for integrated systems, based on criteria ensuring the balanced use of environmental resources”.³

These phrases, written by the artifices of the town plans that marked the city’s appearance, partly summarise the meaning of the 3 cities studied: Assisi, Urbino and Ferrara.

In the words of Astengo, town planner involved in rationally constructing the regulations and researcher attentive to producing knowledge, we see the effort he puts into fighting to safeguarding the “values” of this city. With him, we see a shift in the interest from economic, social and territorial planning to the safeguarding of the historic city and the construction of the new city, from the interest in the

decision-making processes of town planning to structural modifications and urban and environmental requalification, in a bid to give town planning a scientific line.

In Assisi, he studies the state of the territory and city, with particular attention paid to the “analytical-quantitative landscape” and knowledge of the phenomena and facts.

In the Assisi plan, the analytical dimension is the relevant, pertinent part in which the objectives are knowledge of the context through the analysis and finally search for technical solutions with a major commitment in the construction of a methodological machine suitable to arranging the knowledge and organising the construction process of the choices in the firm belief of having to equip town planning with its own scientific statute, a condition by which to ethically found it and therefore give it a form of social authority. Astengo’s plan for Assisi, current as of today, is a concrete example of a global design aimed at studying and preserving the meaning of the whole historic city.

Giancarlo De Carlo in Urbino takes over the organisation of the physical space as the plan centre, in which the project becomes an exploration, but also a way of constructing unprecedented possibilities.

His work stands at the border between town planning and architecture: two aspects of a single discipline to be blended into the design action and theoretical reflection.

In Urbino, he carried out continuous planning works of the city regulated by a loving correspondence between the city itself and the architecture.

He stresses that the area of town planning application is spatial organisation and stresses the architectural project as its cornerstone tool by which to gain knowledge of places, sound out social demand, establish a direct and privileged relationship with the addressees and place demands on the collective imagination from a certain viewpoint.

The role of the town planner is no longer the traditional idea of “hiding” things, but rather becomes that of making contradiction clear.

The terms “town planning” and “architecture” are used indifferently to refer to a single plan of action. He initially focuses on the development of Urbino, binding the city to the university and tourism. During the second stage of the plan, he recognises the link between the historic centre and the surrounding landscape, establishing a series of restrictions to protect the territory.

In Ferrara, from the 1970s, the *Pilot project for a multipurpose park* identified systems connected with the physical and social-economic environment of the territory.

The breakdown of the city into its essential components (centres and active zones, residences, social and tertiary services, infrastructures, marginal areas, etc.) already at that time suggested a synthesis model comprising integrated systems expected as “key places”⁴ for possible interventions.

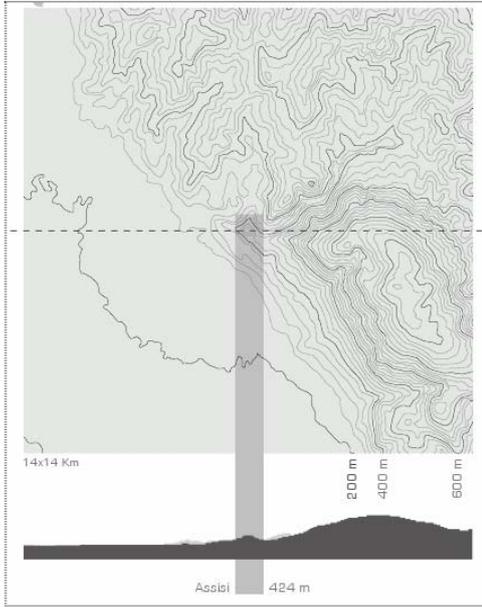
Today, Ferrara is an articulated urban hub with an economic structure that does not depend on a single production sector and which offers various tourist/cultural, health and educational services both to the immediate surrounds of neighbouring municipalities and to various different social groups using the territory defining specific relationship networks to which an equal number of specificities correspond.

The university role places Ferrara firmly in the network of cities such as Bologna and Padua; its tourism includes it a network providing an alternative to Roma, Firenze, Venezia, comprising the polycentral system of “cities of art” such as Mantua, Ravenna, Parma, Verona and Treviso.

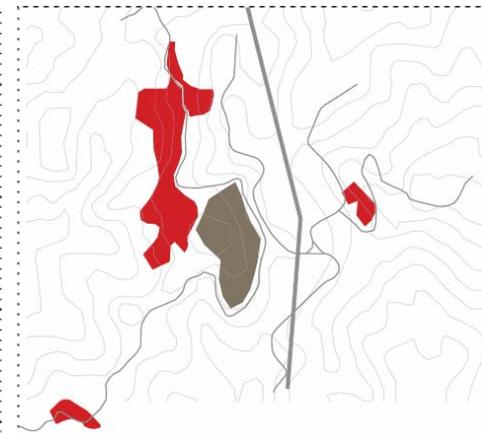
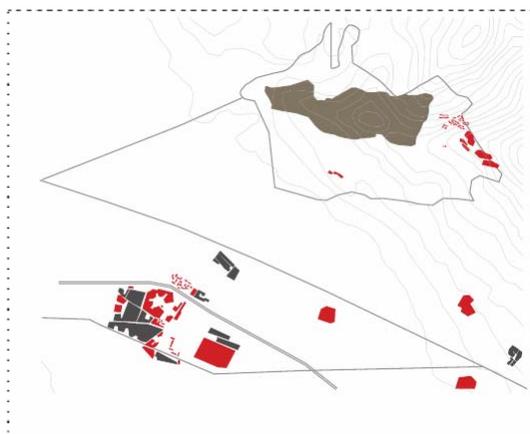
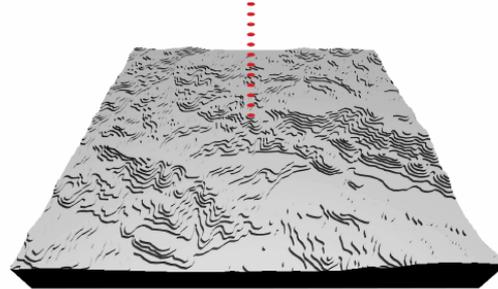
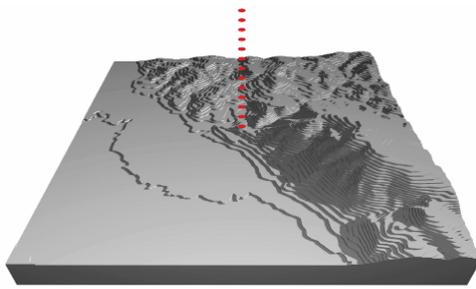
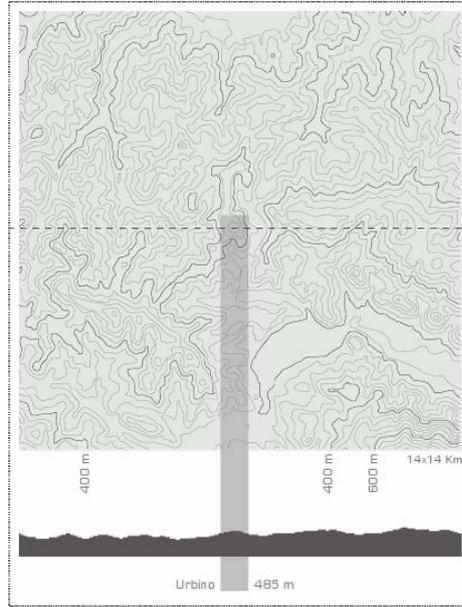
Ferrara therefore takes on the role of medium city, a city that must seek quality in what exists, striving to strengthen and intensify relations between the parts.

In this sense, in Ferrara it is the urban and territorial structure that constitutes the main “common asset”: a cohesive structure that is able to keep spaces, functions and people together.

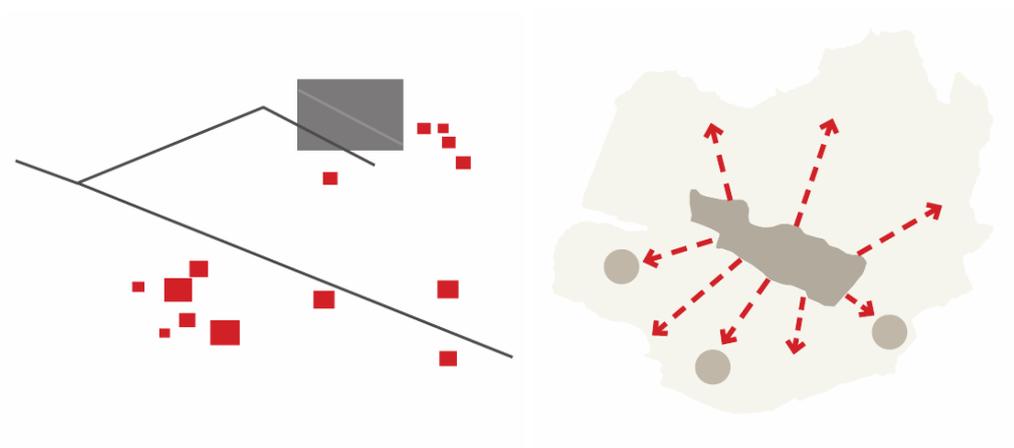
ASSISI



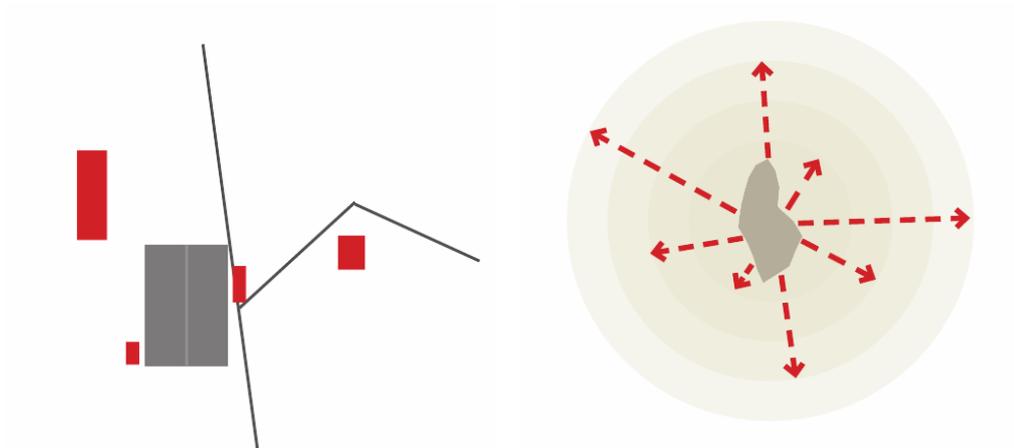
URBINO



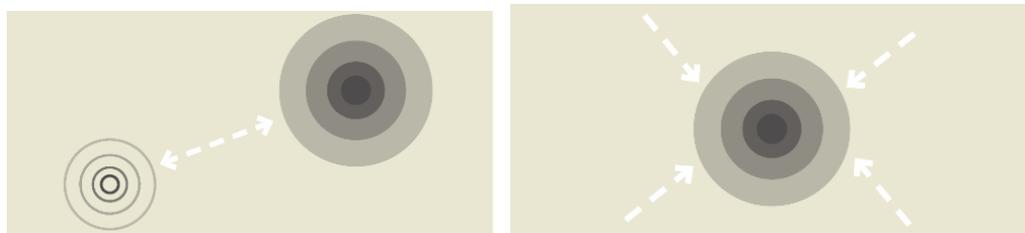
ASSISI: development model



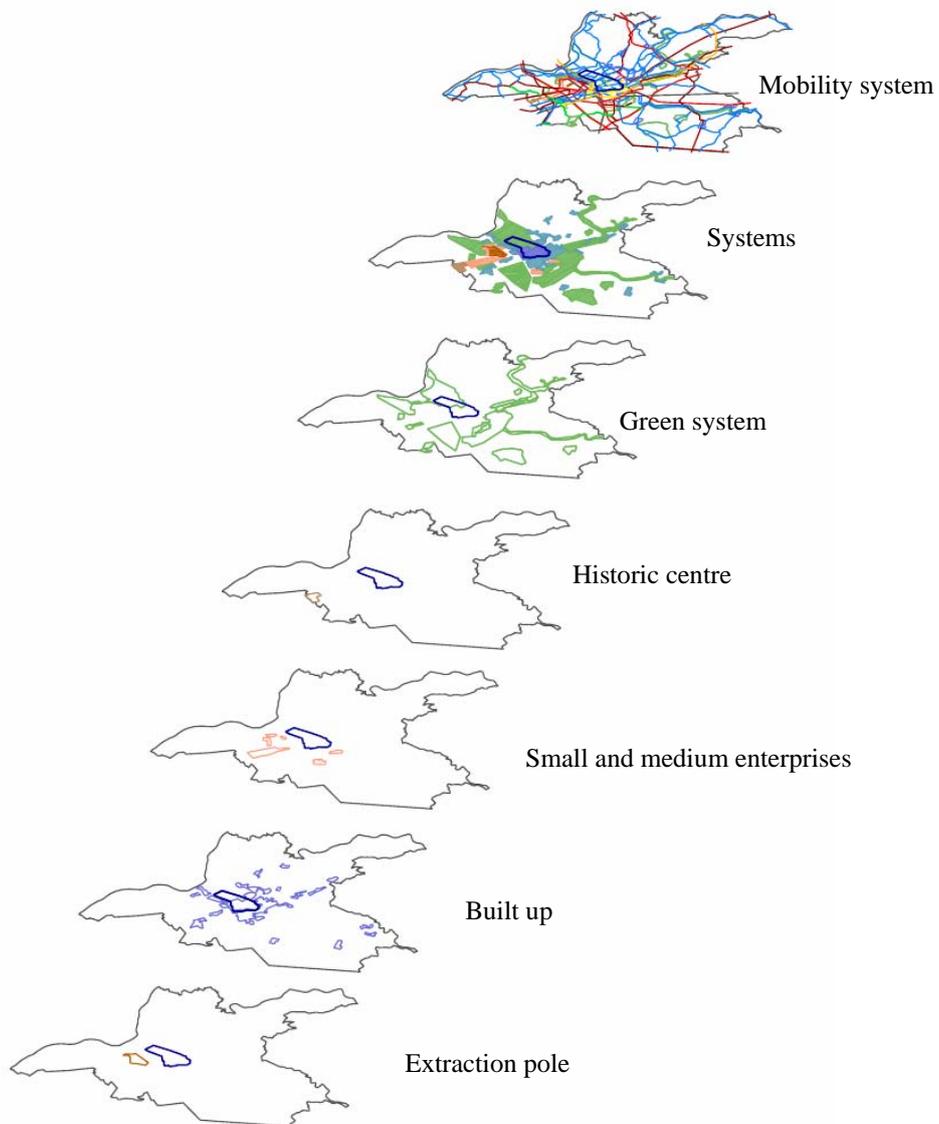
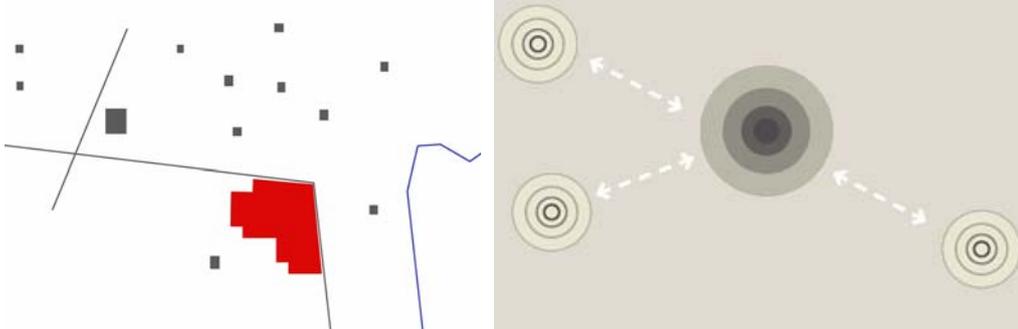
URBINO: development model



Assisi and Urbino: comparison of the two city development models



FERRARA: development model for “systems, networks and relations”



20.2. The identification of HUL in Assisi, Urbino, Ferrara

The methodological approach to the conservation of HUL developed thus far, which saw the 3 cities mentioned previously as case studies, invites us to reflect on certain subjects connected with HUL.

We would recall the definition of HUL as given in the *2011 UNESCO Recommendation on HUL*:

“8. The historic urban landscape is the urban area understood as the result of a historic layering of cultural and natural values and attributes, extending beyond the notion of “historic centre” or “ensemble” to include the broader urban context and its geographical setting.

9. This wider context includes notably the site’s topography, geomorphology, hydrology and natural features; its built environment, both historic and contemporary; its infrastructures above and below ground; its open spaces and gardens, its land use patterns and spatial organization; perceptions and visual relationships; as well as all other elements of the urban structure. It also includes social and cultural practices and values, economic processes and the intangible dimensions of heritage as related to diversity and identity”

and if we refer to the analysis carried out thus far on the 3 historic cities, we can ask ourselves some questions on the meaning and on certain aspects relating to HUL, as reported below.

- What is HUL in these three cities?
- How can HUL be “read” in the three cities?
- What tools have enabled us to get to “know” and “study” HUL?

20.3. Assisi, Ferrara, Urbino: what is HUL?

Assisi, a medieval city built on a hill, is the birthplace of Saint Francis, closely associated with the work of the Franciscan Order. Its medieval art masterpieces, such as the Basilica of San Francesco and paintings by Cimabue, Pietro Lorenzetti, Simone Martini and Giotto, have made Assisi a fundamental reference point for the development of Italian and European art and architecture.

The definition of the **integrity** was fundamental for the World Heritage nomination of Assisi.

The image of Assisi seen from below, with the Subasio in the background, is still today the one reproduced by Niccolò Alunno in his “Gonfalone contro la Peste”

(1468-70) or the one by Cipriano Piccolpasso in his “Descrizione dei caratteri multiformi del territorio storico della città”.

Today, as in the past, the country is developed around some axis of convergence, whose focus is the city and in particular the ancient Hellenic central temple, later dilated into the triangular medieval pattern with the Rocca and its Franciscan basilicas below as cornerstones.

Enclosed by its 14th century town walls, the city shows close functional, morphological and symbolical relations among its parts and between these and its territory, thus pointing out the essential structural and visual uniformity of the whole system. Its original spatial structure has been so incisive as to affect the organization even of the complex of the surrounding areas and the set of functional and perceptive connections established with them. The modern expansion, developed eastwards in continuity of the walled one, is based on ancient piedmont serving paths, thus forming a nonstop sequence of mainly point or row buildings.

The presence of a belt of olive groves and oak woods close to and within the walls represents the distinctive nature of the city, from the Middle Ages up to our time, as it is recorded in ancient iconography.

Praised by artists, scholars, travellers, illustrated by painters and photographers, this spatial organisation is still today highly recognisable despite the recent insertions and transformations along the crossing axis of Umbrian valley and it still presents itself as the cornerstone of the image and settling structure of the whole area and icon of the whole region.

Due to the far-sighted urban planning in the 1950s, the municipal area has however retained almost intact its overall traditional integrity until today.

The original nomination of Assisi on the World Heritage List consisted of the Basilica of San Francesco and the walled Medieval city. Subsequently, the nomination was revised by adding several monuments outside the town, critical for the spiritual maturity of Saint Francis and for the foundation of the Franciscan order.

The meaning of HUL in Assisi therefore extends well beyond relations between the walled city and its surrounding territory, including the highest manifestations linked with the intangible heritage and spirituality.

From a formal viewpoint, HUL includes the walled city and its surrounding territory, which have kept their profound formal and spiritual relations almost intact over time. The walled city, built on the top of the hill, still retains the two main

landmarks comprising the Basilica di San Francesco and Basilica di Santa Chiara, which dominate the surrounding territory.

The main resources of Assisi, in addition to the wealth of architectonic and artistic heritage are also represented by the consolidated use of the land, such as the woodland areas assigned for protection and production concentrated in the area of M. Subasio, the olive groves concentrated at the foot of the hills and which face out onto the Valle Umbra, and the traditional agricultural produce of the plains.

The territory is characterised by strong formal and spiritual links in the mark of the Franciscan influence, between the walled city and *frazioni* (districts), ensuring that spatial relations remain between the main religious and tourist poles and the ancient pilgrimage routes.

The small hill town of **Urbino** experienced a great cultural flowering in the 15th century, attracting artists and scholars from all over Italy and beyond, and influencing cultural developments elsewhere in Europe. Owing to its economic and cultural stagnation from the 16th century onwards, it has preserved its Renaissance appearance to a remarkable extent.

The small historic centre enclosed by the walls is characterised by a strong symbolic link with the surrounding landscape, and this dominates the area with the powerful volume of Palazzo di Federico.

“The town is reflected in the landscape, the landscape prepares and sustains the appearance of the town. Therefore safeguarding the landscape is as important as safeguarding the walled town.....” These are the words of Leonardo Benevolo in his illustrative report on the town planning model of the ‘80s, identifying the background comprising the first series of ridges that surround the historical centre.

The importance of the landscape overall was then affirmed by Giancarlo De Carlo with the ‘94 model which increased protection around the historical centre with the boundary of the east section of the Parco delle Cesane, the scenery of the Conce, and the areas of the Scientific Park.

The events related to the strong university expansion, seen in the 1960s as the driving force of the territory’s economy, and the consequent dwindling of the residential population in the historic centre, in addition to the lack of an alternative territorial growth/development policy to university and tourism, generated a great fragmentation of the city.

From a formal viewpoint, HUL includes the walled city and its surrounding territory, but differently from Assisi, the historic centre of Urbino would appear to be more isolated.

The landscape that surrounds Urbino is characterised by the presence of flourishing hills with alternating rows of trees and ploughed fields. It is still very similar to the landscape depicted by Piero della Francesca in his painting *The Baptism of Christ*, dated between 1448 and 1450.

The territory of the Urbino dukedom and the high valley of Metauro, rich with natural features of historical-architectural value, is characterised by the presence of small districts, with collective rural characteristics still linked to ancient trades based on the use of natural resources.

Federico da Montefeltro characterised this territory significantly, merging the town and adjacent countryside around his court, prevailing over the Malatesta family of Rimini.

Urbino marked this land significantly with an extraordinary concentration of beautiful houses, exclusive residences, medieval towers and excellent rural architecture.

Ferrara is a HUL that brings together an urban landscape and a cultural landscape that is extremely complex. It is a territory that man has shaped over the centuries, using a territory that has been affected by events that have often determined the morphological structures and landscaped profiles and that still today remains filled with stimuli and opportunities for the future.

From the 15th to the 16th century, Ferrara was an intellectual and artistic centre able to express the very best of the Italian renaissance. The concept of an ideal modern city took form in the districts built by Biagio Rossetti according to the new principles of perspective.

The territory of Ferrara was fully defined during the Renaissance with the major projects of Este, the town planning and important reclamation works. Thus this a swampy, ever-changing territory had canals, roads and hamlets built into it, dotted by architectonic and landscape elements in the form of sumptuous villas, the *Delizie*, surrounded by woodlands, parks and gardens.

Concrete thresholds were reached in that period, characterising the territory with an order that is still able to be seen today.

Today, Ferrara is an articulated urban centre whose approach to the study of HUL takes the form of a series of *networks* and *relations* between the parts, within the walled city and from the walled city towards the surrounding territory.

The main systems were therefore identified that govern the city and the territory, namely the system of mobility, living, production, the environment and territorial “equipment”, which evoke possible ways in which the territory can be used; they tell us of the function of the city, forming a sort of critical description, but at the same time they also outline possible scenarios for the transformation and development of HUL.

20.4. How can HUL be “read” in the three cities?

For **Assisi**, reading and understanding HUL means first and foremost studying the visual, functional and structural relations of the historic centre with its territory, in a series of relations that can be defined as “**vertical**”:

- from the functional/structural point of view, we have seen how the particular sensitivity aimed at protecting the historic nucleus and surrounding landscape that began back in the 1960s with the drafting by Astengo of the PRG and continued up until today with the drafting of the new structural PRG and Management Plan has meant that the structural and functional integrity of the historic city is basically maintained.

The comparison between the old and new cartography in relation to the city has enabled us to recognise the substantial maintenance of morphological and functional characters of much of the territory. Transformations are inevitably underway on the plains, above all in the *frazioni*, where the disorderly urban transformation of the last decades, particularly near the SS 75, have generated a fragmentation of the territory. For the hilly and mountainous part, instead, the conditions of integrity have basically been maintained.

In terms of the visual integrity, we have seen how the walled city continues to preserve its visual relations with the surrounding landscape virtually intact. The specific conformation of the ancient nucleus, visible from afar, allows us to sharply define the visual relations from/to the walled city, also defining the areas characterised by the greatest critical issues.

Assisi is also universally known as the city of San Francesco, the city of peace, from which the cult of the Saint has subsequently spread throughout the world. A series of pilgrim/cultural trails that connect the main Franciscan locations branch off from both places: the Assisi-Santa Maria degli Angeli road, the trail from Assisi to Gubbio, the Assisi-Eremo delle Carceri trail, the Assisi-San Damiano trail, the Assisi-Rivotorto trail .

The territory of Assisi can therefore also be “read” in a succession of **horizontal** relations that bind the walled city with its territory and which push beyond the national confines both in functional terms and with regards to the spiritual inter-relations of the city with the territory: the system of routes that lead to the basilicas, the pilgrimage networks, the spiritual meaning that binds the city to the territory, the functional relations between the city and the plains or between the city and the hill, take us to read the city not only in a vertical sense, as a relationship between subject-object, but also horizontally, as both physical and metaphysical relations that drive beyond the boundaries (see Farinelli with regards to matters relating to the object-subject relationship and linked to the *spirituality* of the landscape).

Urbino is less visible than Assisi. For Urbino too, reading and understanding HUL means first and foremost studying the visual, functional and structural relations of the historic centre with its territory, with a reading that privileges “**vertical**” relations.

From the functional/structural point of view, we have seen how the development of the city is around the historic nucleus, with the development of university complexes and the area of the hospital, still expanding today.

Particular sensitivity has been seen with respect to the protection of the historic nucleus and the surrounding landscape with the PRG prepared during the 1990s, which paid particular attention to the landscape surrounding the walled city.

The comparison between the old cartography and the current situation has enabled us to recognise the substantial maintenance of morphological and functional characters of much of the territory. Transformations are still underway in the areas surrounding the historic centre. For the hilly and mountainous part, instead, the conditions of integrity have basically been maintained.

In terms of visual integrity, the specific conformation of the ancient nucleus enables us to define the visual relations from/to the walled city, in this case too defining the areas characterised by the greatest critical issues.

The events related to the strong university expansion and the consequent dwindling of the residential population in the historic centre, have generated a great fragmentation of the city with a substantial lack of horizontal relations between the centre and the *frazioni*.

For **Ferrara**, the methodological approach taken to the study of HUL has sought to highlight the city's functional systems and the new possibilities of connecting the historic centre with the surrounding territory by means of the development of a series of networks and connections.

An approach that has seen the reading of the city with a set of **horizontal** relations made up of systems and interconnections within the walled city but also and above all from the walled city to the territory, through the connection networks, the mobility networks, the environmental continuity systems and those of collective places, highlighting one of the most important tasks for planning the contemporary city, or attempting to reconnect what the development of past decades has often fragmented.

The study of the historic city of Ferrara took place through the analysis of the relations characterising the city and its territory.

The system of the historic city would here appear to be fragmented. The historic city within the walls is characterised by the partial loss of the original traits of the settlement following the construction of poor quality building in both outlying and central areas.

The system with which Ferrara functions is horizontal and can be summarised as a "system" approach (university, dwellings, business, roads, etc.), which connect it to the rest of the territory.

We can therefore consider a development of HUL in line with the existing city, working on networks, relations, etc., i.e. seeking to connect what there already is, enhancing and re-ordering it.

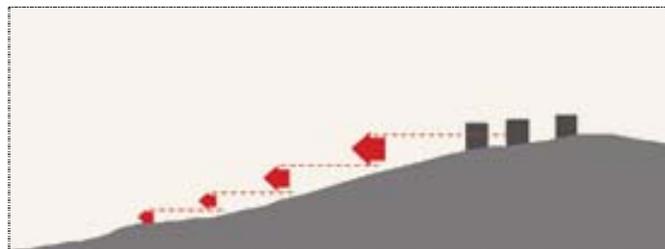
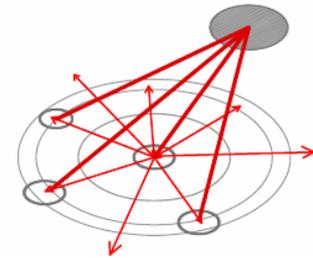
Therefore, one possible scenario may consist of the need to work on the existing city, expanding the centre, creating networks and connections and

integrating the meaning of the historic centre within the complex system of networks and relations comprising the city.

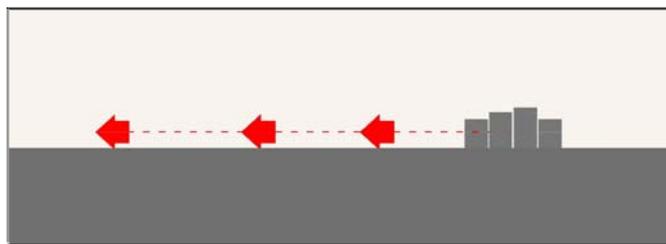
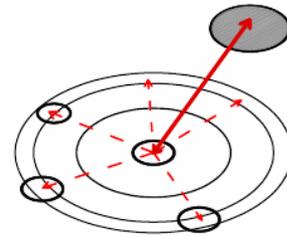
The methodological approach taken to the study of HUL in the case of Ferrara, which is basically similar to that of the other 2 cities, has established the study of planning tools of the Municipality and a general look at the general regulatory tools of the other 26 Municipalities included in the “Ferrara, città del Rinascimento e il suo delta del Po” site, which are reunited in adopting shared planning.



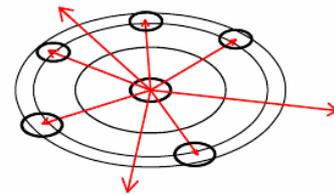
Assisi



Urbino



Ferrara



Assisi, Ferrara and Urbino: a diagram showing the three possible “ways of reading the city”: on the left, Assisi structured with the group of vertical and horizontal relations that bind the walled city to the surrounding territory; in the centre, Urbino, structured with all vertical relations that bind the walled city to the surrounding territory, to the right Ferrara, structured with the system of horizontal “networks and relations”.

20.5. What tools enable us to get to “know” and “study” HUL?

The study of the 3 cities has been developed through the analysis of the wealth of cartographic⁵, iconographic and historical sources that tell the story⁶.

The image of Assisi appears in the G.Astengo's description in *Urbanistica* 24-25, 1958: “Landscape, light, colour, houses, medieval towers, squares and famous buildings: a multitude of reciprocal perspectives from below and from uphill and, within the city, in the large sections of this built space; a sense of widespread calmness and sweetness, here are the traits contributing to build up the nature of this extraordinary city⁷” is the same as today.

The new General Structural Plan⁸, which, continuing the long route traced 60 years ago by Astengo, is marked by an in-depth awareness of the territory's resources, and the cartography and reports comprising the 2011 Management Plan, are the main source from which *The methodological approach to the conservation of HUL of Assisi* was created.

Relating to Urbino, the wealth of iconographic documentation allows us to understand the central political, artistic and economic role played by the city during the Renaissance: from the portrait of the Dukes to the view of Vanvitelli⁹ or the *Atlante dei Dominii Rovereschi* by F. Mingucci.

The landscape surrounding Urbino is characterised by the presence of flourishing hills where worked fields and rows of trees alternate and is still very similar to the landscape depicted by Piero della Francesca in his tempera painting on board entitled “Il Battesimo di Cristo”¹⁰.

The cartography and the reports comprising the Piano Regolatore of Urbino, the PTC of the Region Marche and the PTCP of the Province of Pesaro-Urbino are the main source from which the information was taken to prepare *The methodological approach to the conservation of HUL*.

For Ferrara too, we have seen how the wealth of iconographic sources have enabled us to reconstruct the history of the city and its urban evolution.

The “*Carta dei Ducati Estensi*” is, in this sense, an authentic *monumentum*, an intellectual work that represents the cultural manifestation of the Ferrara courtesan civilisation of the Renaissance period.

Developed by Pasi in 1571, it documents both the political dream of an Este jurisdiction from the Adriatic to the Tyrrhenian (cartography developed with the

presence in a corner of the drawing of a stretch of this sea), as well as roads, urban nuclei (towns, villages) and buildings of noble power, represented emphatically off-scale in a third dimension.

The *Atlante del Ferrarese*, a seventeenth-century cartography collection of Alberto Penna also contains a collection of *Carte generali e particolari di tutto lo Stato di Ferrara levate dagli originali di Bartolomeo Gnoli e d'altri ancora (in Ferrara in the year 1658)*.

The cartography and the reports comprising the PRG of Ferrara are the main source from which the information was taken to prepare *The methodological approach to the conservation of the city's HUL*.

Further essential sources for the study of the place and the preparation of the Methodological Approach to the conservation of HUL are the PTCP of the Province of Ferrara and the Management Plan relative to the UNESCO site.

20.6. The approach to HUL

The 2011 Recommendation on HUL continues as follows:

11. The historic urban landscape approach aims at preserving the quality of the human environment, enhancing the productive and sustainable use of urban spaces while recognizing their dynamic character, and promoting social and functional diversity. It integrates the goals of urban heritage conservation and those of social and economic development.(...)

12. The historic urban landscape approach considers cultural diversity and creativity as key assets for human, social and economic development and provides tools to manage physical and social transformations and to ensure that contemporary interventions are harmoniously integrated with heritage in a historic setting and take into account regional contexts.

13. The historic urban landscape approach learns from the traditions and perceptions of local communities while respecting the values of the national and international communities".

Traditional tools for planning no longer seem appropriate to adjust transformations of historic cities....

... why do planning tools sometimes no longer seem appropriate or sufficient to regulate the transformations of the city outside the historic centre?

In view of the growing scale of the levels of urbanisation achieved and the possible negative consequences on the urban areas and their structure, the Recommendation on HUL highlights the need to consider the city *as a whole*, also

including the contemporary architecture, which together with the urban territory, now represents our new *topos*.

The city is a continuously evolving organism that may be able to transform itself but at the same time must be able to maintain the characteristics of its very identity of the place.

In this sense, an HUL approach is suggested that is able to manage the transformations, starting from an analysis that identifies the system of resources and qualities of the place, or its meaning.

The approach to the historic urban landscape must consider the social and economic development of the areas in which it intervenes and aim to define the tools able to manage the transformations of the territory both of a physical and social nature, at the same time promoting a harmonious integration of new interventions.

Particularly in the second half of the 20th century, the increasingly rapid expansion of metropolitan areas has led to an increase in land value.

Thus areas outside urbanized land have become subject to development pressures, often without proper planning.

As a result, farming land has been transformed into industrial or storage use or similar, and the traditional settlements have lost both their rural nature and their original **qualities** and taken on a more suburban character.

In the new situation, such areas have become vulnerable under the impact of irreversible change, and the existing conservation legislation and norms have not necessarily been adapted to face the new challenges.

In many historic cities we witness the chaotic expansion of suburbs - often taking place under an inadequate control from the point of view of urban legislation - and an improper exploitation of their resources, while the historic centre is on the all sufficiently safeguarded. It is important to stress that the insufficiently control of outside areas can produces a negative impact on the historic centre: it is the case of Assisi, for example, were the tourism pressure, the consequent increasing of traffic and the lack of adequate infrastructures produce a chaotic pressure in the centre.

At the same time, the rigid protective restrictions imposed for the historic centre and consequent development of the city on the plains, have led to a chaotic, disorderly development of the *frazioni*. We therefore need to consider the conservation of the historic centre, but also a suitable protection/development/conservation policy of all the historic urban landscape, not

only the historic centre, with a view, therefore, to extending the concept of conservation, and it is in this spirit that research falls.

The policies to safeguard the city should, therefore, be integrated and include the whole territory, not just the historic centre.

The qualities continue to be valid references regarding the recognition and safeguarding of historic urban landscapes. The identification of a Historic Urban Landscape should be understood as the result of a social-cultural recognition of *specific qualities and associated values* in the built environment in its setting, justifying measures of safeguard. It is necessary to verify the compatibility of use and the correspondence of the existing structures to the historically consolidated patterns, as well as the state of conservation of the significant elements and characteristics. As a result of such assessments, it is possible to identify appropriate policies and strategies aiming at safeguarding existing features, and eventually recovering partly lost elements so as to enhance the qualities of the HUL. At the same time, it is also necessary to establish a system of management and monitoring, in order to anticipate and guide any potential transformations in harmony with the qualities of the place.

Historic Urban Landscape means an approach to the identification and recognition of specified qualities, characteristics and significant relationships in the built and natural territory, resulting from **processes over time** and being associated with multiple layers of significance. Safeguarding and Integrated Development mean processes of planning and management, while monitoring and controlling the forces and rates of change so as to retain and/or regenerate and enhance the qualities of HUL.

Historic Urban Landscapes often refer to relatively large territories including associations to even distant features. Consequently, considering the complexity at stake, there will be need for a number of different planning and management instruments. Obviously, the choice will need to be decided case by case taking into account the scope of the work. HUL may contain protected historic buildings, urban or rural conservation areas, as well as protected natural environments. Essential is that all these plans and related management systems be properly cross-referenced. In particular, it will be necessary to monitor that there are no proposals that would potentially conflict with the principles and strategies expressed in HUL.

The definition and implementation of HUL would be mainly based on the existing and/or newly created planning and management instruments according to case. HUL would not be just another master plan, but rather it should offer a general policy reference for safeguarding and integrated development policies and strategies. There are many analyses that are necessary as part of the process of recognition of HUL. These could be undertaken using the existing planning/management instruments. Similarly, the implementation of the safeguarding measures, land-use planning and management could be carried out within the frameworks of existing instruments. The recognition of HUL will most probably require some additional information and management measures, which should be taken care of and the results integrated into the relevant instruments. **Consequently, we can consider that HUL once recognised would become an overall management framework. It would be implemented through the various tools necessary for the control and development of the built and natural environment, but taking into account and integrate the principles and guidelines developed in reference to HUL.**

The study performed in the three cities has concerned the common resources of the territory that go beyond the Outstanding Universal Values for which the property was inscribed on the WHL.

The future development of the city needs to be forecast, considering the importance of these resources, assessing their vulnerability and the possibility of change and finally envisaging future conservation/development actions that consider these resources with the final objective of not losing the meaning of HUL.

20.7. Limits of Landscape and limits of HUL.

In an article entitled "La capriola del paesaggio"¹¹, Franco Farinelli writes:

"(...) The landscape, therefore, is an unlimited matter, its existence raises the problem of how a group can be obtained that is both visible yet without boundaries and therefore, not able to be measured, and precisely because of this, is extremely difficult to solve: the question of totality. Which in any case means distinguishing the landscape from all other models (territory, space) referring to the face of the Earth, on the contrary by nature limited, with which it is, in a relaxed, easy manner, generally now aimed at being coincided. We will return to the current objective need to have them coincide in a moment. But if we do not immediately separate the concept of landscape from that of space and territory right from the beginning, this need becomes incomprehensible. Landscape, territory, space, not groups of objects but ways of representing them. In the language of Frege, the founder of contemporary analytical philosophy: they do not correspond to the meaning of the Earth

(which is the Earth itself: the meaning is the thing) but its senses, the different, specific ways in which the Earth presents itself, is given. And each of these ways depends on a specific intention, a different way of historically-determined collective desire, it obeys a gaze that confirms another project with respect to the current one.

The map is the device by which we translate (and transform) the world in terms of classic geometry, of space. On the contrary, the landscape corresponds to everything that escapes this grip, this claim: to everything that the map cannot grasp and reduce to itself of the world, namely expressing it in terms of the separation of subject and object, placing distance between them. In this regard, we must be even more specific: Only the diaphragm comprising the map enables the distinction between subject and object; by contrast the landscape model is based precisely on the impossibility of this separation, this distinction, on the non-existence of any interval between the two essential terms of the knowledge process.

(...) This is because in 1969 the Network was born, and, as Manuel Castells explained, when we say "Network", we mean an aggregate within which it is impossible to distinguish between machine (hardware), the intelligence it incorporates (the "software") and the men and women in charge of making it work. We need merely add that, precisely like the first humboldtian stage of awareness, the form of perception that is the Network implies, does not consequently result in a distinction, i.e. the distance between subject and object, precisely because, just like the landscape, the world of the Network is a world that is anti-Kant *par excellence*, within which, therefore, time and space have almost no more importance and have almost entirely ceased all constitutive function. In short: thus far, or almost, the model of the mind was the map, a limited but open structure and all modernity perceived and constructed the world in its image and resemblance, namely spatially. But today, globalisation, through the deadly vehicle that is the Network, forces us to acknowledge that the world is not a map but a sphere, a globe, whose structure, which cannot be reduced to that of the map, is, on the contrary, closed but unlimited: which means first and foremost not only that there is no longer distance or perhaps difference between subject and object, but that all perception of the world is, precisely and only as that of the landscape, concrete and aware image of the "sensitive-infinity" as Humboldt said, of the therefore fatally incomplete nature of what we see, structurally incomplete with what we know and programmatically partisan (even when aimed at totality) of what we do. At the times of Humboldt, the *dunstige Ferne*, the "cloudy distance" that caused the horizon of landscapes to oscillate and much fascinated Goethe too, was first a hint of the rest of the world that remained to be discovered, but also of the uncertainty of the German political events, suspended somewhere between reform and revolution. Today, it instead refers directly to the spherical condition of the form of the world, to the global nature of its function, which no longer supports spatial logic or angst and the definitions connected with the cartographic image.

Who or what prevents us at this point from thinking that the next model with which we will represent the mind will be that of the landscape? Who or what prevents us at this point from thinking, therefore, that the next model with which we will represent scientific logic will be the artist's work, always headed in the same direction in which the world function today heads: to keep the subject adhering to the object and vice versa, if there must be a gap between them?"

The words of Franco Farinelli suggest some reflections on the concept of landscape and HUL: the landscape, therefore, is an unlimited question, and in studying HUL the question is raised as to how we can approach a set (HUL) that is at the same time visible and able to be governed, even if conceptually without boundaries and therefore unable to be measured and not able to be enclosed within a map. But in this case we need to take a step back and return to the concept that Landscape, territory and space are not groups of things but rather ways of representing them. They do not correspond to the meaning of the Earth (which is the Earth itself: the meaning is the thing) but its senses, the different, specific ways in which the Earth presents itself, is given. And these specific ways consist of tangible and intangible resources of the territory, which extend beyond the administrative boundaries of the territory itself. Considering that the intangible heritage of Assisi, for example, the meaning of which and importance of which extend far beyond not only local boundaries but actually national boundaries too, extending worldwide with the Franciscan cult, is therefore a way by which to go beyond the “confines” dictated by the map and “beyond” the map itself.

The map, which is the device we use to translate space, in this case no longer suffices to outline the meaning of HUL, which goes well beyond and which embraces the physical and metaphysical questions of the historic city.

The concept of HUL corresponds to everything that escapes the demand to limit the meaning within a map, but becomes a far more extensive concept that goes beyond boundaries. It is clear, in any case, that the methodological approach to the study of HUL formally entails the simplification of the representation of the territory in a map_ how else could we lay it out? And this too is a simplification, or a limit perhaps, ideally, however, its meaning goes beyond this.

20.8. HUL approach in Assisi, Urbino and Ferrara

As already stated in the first part of this research, the strategies linked to conserving the HUL should be incorporated into the existing planning tools. **It includes the idea on which the word "conservation" of HUL includes "conservation and development" and signifies to put more attention to the environmentally sustainable management and controlled development of areas forming the context/setting for the significant historic centre .**

The methodological approach developed thus far in relation to the three cities concerned by the study has entailed the identification of the territorial resources, both of the historic centre and the entire surrounding territory, the definition of the vulnerabilities of the actual resources and their possibility of change in relation to the lack of suitable protection instruments or the intrinsic characteristics of the areas themselves.

This study has resulted in the construction, for each city, of a map of intensity that has defined the weight and importance of the resources in macro areas with similar characteristics, and the construction of a map of vulnerabilities. The subsequent preparation of three-dimensional models has made the “weight” and “importance” of the resources and their vulnerabilities more visible.

The definition of the CCS/CDS is therefore based on the assumption that the areas in which the resources are more intense, because more protected or because they have more important qualitative characteristics, must have an applied conservation policy (no-go areas). The most vulnerable areas in which the weight of the resources is somewhat less or where there are insufficient protection instruments may be subject to controlled development, entailing both the construction of modern buildings and the “patching up”, by means of town planning interventions, of the existing fabric.

In this sense, therefore, the approach to HUL provides for the expansion of the concept of conservation, which is intended not only in the strictest sense, but which also includes the possibility of developing the whole territory in relation to the aim of maintaining the *meaning* of the historic city.

In the case of Assisi, with regard to the possibility of urban development in the town, this must occur outside the historic centre, near the hamlets which are already seriously compromised.

Consequently, urban expansion could be assumed for the hamlets of Santa Maria degli Angeli, Petignano and Palazzo in particular, which are already compromised significantly due to widespread, random urbanisation, accompanied by the ultimate objective of modernising the existing structures.

In the case of Urbino, in terms of urban development, we have seen how the historic centre, and the whole Urbino territory in general, is subject to strict protective legislation.

Further building development would be undesirable in these areas, to avoid compromising the integrity and original character of the historic urban landscape.

The 1994 PRG stifled development in the hamlets with intensive building surrounding Urbino, especially in the area behind the historic centre and in the area of Casino Noci, where the sustainable development of these areas could now be considered, even by intervening on existing developments by upgrading them, in addition to creating new social and economic development opportunities for the town.

For Ferrara, in relation to the definition of CDS/CCS, an analysis of the protection instruments concerned by the territory has enabled the definition of the areas in which the “weight” of resources is greater and in which these resources are best protected: these are SCIs, areas included in the UNESCO core and buffer zones, the historic centre and areas involving the ancient water courses and riverbeds.

These areas, as can be seen in the 3D (Intensity) model, visually create proper “walls”, barriers almost impossible to cross in which the “weight” of resources really is very high.

The areas behind the historic centre have been involved since the years of urban development, by a widespread, often uncontrolled development, and it is on these areas that we need to intervene, through the definition of a development/conservation strategy aimed at preserving the character and meaning of the historic urban landscape in respect of the ancient city.

In these areas, involved by the presence of the most important urban agglomerates, small and medium enterprises, the petrochemical industry and the most important production and commercial activities of Ferrara, the CDS/CCS envisage the requalification of the urban fabric, also present with the construction of new buildings, with a view to conserving the concept of the city.

The city enclosed within the historic centre and immediately next to it, where resources have a greater weight, should be involved by the strict conservation limits (strictly no-go areas), whilst other areas of the Ferrara territory (partially intact areas that require careful attention to planning, design and implementation) for their morphology and geological and physical characteristics should be carefully assessed and preserved by further urban development.

20.9. Aspects of Landscape, Cultural Landscape and HUL in Assisi, Urbino and Ferrara

Referring to the cities that are been object of the study, it can note that they can be perceived as a **Landscape**.

The *image* of Assisi, seen from below, with the Subasio in the background, is still today the one reproduced by Niccolò Alunno in his “Gonfalone contro la Peste” (1468-70) or the one by Cipriano Piccolpasso in his “Descrizione dei caratteri multiformi del territorio storico della città”.

Today, as in the past, the whole city is developed around some axis of convergence, whose focus is the historic centre and in particular the ancient Hellenic central temple, later dilated into the triangular Medieval pattern with the Rocca and its Franciscan basilicas below as cornerstones.

Enclosed by its 14th century town walls, the city shows close functional, morphological and symbolical relations among its parts and between these and its territory, thus pointing out the essential structural and visual uniformity of the whole system.

The small historic centre of Urbino, enclosed by the walls, is characterised by a strong symbolic link with the surrounding landscape, and this dominates the area with the powerful volume of Palazzo di Federico.

“The town is reflected in the landscape, the landscape prepares and sustains the appearance of the town. Therefore safeguarding the landscape is as important as safeguarding the walled town.....” These are the words of Leonardo Benevolo in his illustrative report on the town planning model of the ‘80s, identifying the background comprising the first series of ridges that surround the historical centre.

These cities can also be defined as a **Cultural Landscape** resulting from research in the history of the place: the territory is characterised by a long stratification of significances in the centuries, since the Late Neolithic period, continued until the Roman period, the Medieval Age and beyond.

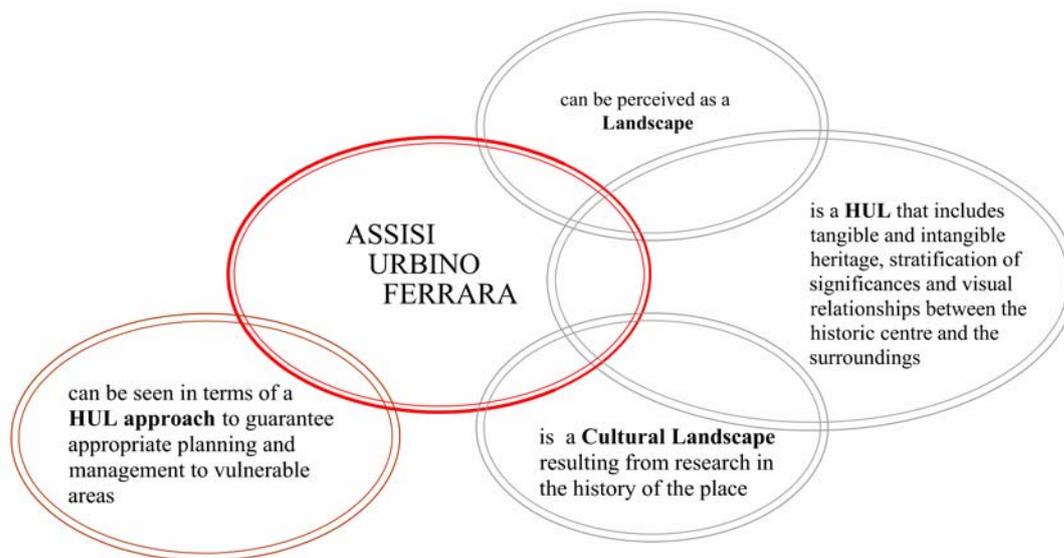
Ferrara is an articulated urban hub that brings together a historic urban landscape and a Cultural landscape that is extremely complex. It is a territory that man has shaped over the centuries, using a territory that has been affected by events

that have often determined the morphological structures and landscaped profiles and that still today remains filled with stimuli and opportunities for the future.

These cities are an **Historic Urban Landscape** that includes not only the cultural heritage of the walled city and surrounding territory, but which also includes the highest manifestations connected with the intangible heritage and spirituality.

They can be seen in terms of a **HUL approach** to guarantee appropriate planning and management to vulnerable areas, i.e. in particular near the hamlets which are already seriously compromised significantly due to widespread, random urbanisation, accompanied by the ultimate objective of modernising the existing structures, with the aim of preserving the meaning of the historic city "as a whole".

The basis of course is to consider the historic city as a dynamic entity – and not a static one any longer – where people live every day and where development and conservation are supposed to supplement each other in a joint process which should provide appropriate tools and management plans.



Aspects of Landscape, Cultural Landscape and HUL in Assisi, Urbino and Ferrara

Notes

¹ Urbanistica Quarterly INU magazine, no. 24-25, 1965 directed by Giovanni Astengo: "Universalmente conosciuto ed a giusto titolo considerato come uno dei centri più ricchi di testimonianze di storia, d'arte, di valori ambientali e paesistici, Assisi, trovatosi incluso nel primo elenco dei cento comuni obbligati a redigere il piano, si presentava come uno dei più ambiti soggetti che potessero offrirsi allo studio di un urbanista. [...] Sono stati gli aspetti straordinari, multiformi e contraddittori del soggetto a sollecitare una conoscenza spinta ai più minuti fattori fisici ed umani ed a stimolare una confacente metodologia di indagine e di pianificazione; e che è stata proprio questa necessità di precisa individualizzazione, in un ambiente che si presenta già concretamente e minutamente individualizzato, a richiedere che la progettazione non si arrestasse alle generiche e semplificate indicazioni del piano comunale, ma giungesse a definire ed a caratterizzare in concreto i singoli interventi

² A. Mioni e E.C. Occhialini, *Giancarlo De Carlo Images and fragments*, Electa, Milano, 1995.

"Urbino appare in maniera diversa a seconda che la si osservi dal suo interno, in tangenza, dall'esterno vicino e dall'esterno lontano; e questa differenza di percettibilità che presenta la moltiplica di aspetti che finiscono col diventare un'unica immagine di grande ampiezza.

Ho cercato di rovesciare una pratica che sembra consueta nell'urbanistica italiana, e forse in gran parte della cultura italiana, di discutere sempre della "generalità" con la promessa dichiarata ma raramente attuata di discendere poi ai "casi particolari".

[...] Lo scopo immediato era di mettere a punto un programma di azione urbanistica che servisse per Urbino; lo scopo lontano era di fornire indicazioni che potessero assumere un significato più generale, al di là del caso affrontato".

³ Giulio Rossi Crespi, G.Ingaglio, M.Mastropietro, G.Pantuso, Safeguarding, recovering and organising a natural and historic environment (pilot project for a multipurpose park) in Parameter no. 34 March 1975, From Ferrara to the sea.

"Questo studio sul ferrarese si propone come "pilota" proprio perchè cerca di definire metodi di progettazione e strumenti di attuazione e gestione che consentano uno sviluppo per sistemi integrati, basati su criteri di utilizzazione equilibrata delle risorse ambientali".

⁴ See Parameter no. 34/March 1975, p. 13

⁵ Cartography, in actual fact, is purely a tool by which to read the territory and thus also the mentioned vertical or horizontal relations are a simplification that enable us to read HUL. Farinelli, in this respect, in his book "L'invenzione della Terra" says: Just as today the universe – the astronomers say – is a collection of stories, the Earth has since the beginning been a **set of models**, by means of which we create order and establish relations between the things comprising "the space filled with terrestrial objects". Through cosmogony, cosmology, science, literature and art, what animates western reflection is the antithesis between two major, formidable models, which are alternatives and cannot be reduced: the map and the globe. Everything about modernity has been built on the first, through the reduction to this of the world and it is thus that the western culture has invented the Earth.

But today, the world's function no longer depends on space and time, which for science exist only in the form that they exist on the maps. Today we need to deal directly with the globe, with none of the traditional mediations. And as all our models have directly or indirectly been of a cartographic nature, this means that we urgently need to re-invent the Earth.

Così come oggi l'universo – dicono gli astronomi – è una collezione di storie, la Terra è fin dall'inizio **un insieme di modelli**, per mezzo dei quali mettiamo ordine e stabiliamo relazioni tra le cose di cui si compone “lo spazio riempito di cose terrestri”. Attraverso la cosmogonia, la cosmologia, la scienza, la letteratura e l'arte, quel che anima la riflessione occidentale è l'antitesi tra due principali e formidabili modelli, alternativi e irriducibili fra loro: **la mappa e il globo**. L'intera modernità è stata costruita sulla prima, attraverso la riduzione ad essa del mondo, ed è in tal modo che la cultura occidentale ha inventato la Terra. Ma oggi il funzionamento del mondo non dipende più dallo spazio e dal tempo, che per la scienza esistono soltanto nella forma in cui esistono sulle mappe. Oggi dobbiamo fare i conti direttamente con il globo, senza nessuna delle tradizionali mediazioni. E poiché tutti i nostri modelli sono stati, direttamente o indirettamente, di natura cartografica, ciò vuol dire che dobbiamo urgentemente procedere alla reinvenzione della Terra.

⁶ The history of western cartography begins with images of the city. They are cities, according to the definition just given, because the images in question are the result of a self-representation process, namely because the place depicted coincides with the place of production tangibly of the image and, above all, of the symbolic, creative code of reference. The Modern begins exactly when this code becomes geometric: the “certainty of representing”, that is the reduction of the world to cartography is of an exclusively topographic nature. It is precisely because of this code no longer being functionally decisive that we can today begin to criticise it. But at the same time, it continues to function, at least in two meanings.

The paradox of the labyrinth applies to the network: you can think it but not represent it. Represent it means to give it a centre and therefore remove its very nature.

The map of the network is nonsense. The model of the labyrinth shows us the limits of our culture, so used to causing knowledge to coincide with representation.

I believe that the difficulty we have in considering globalisation depends precisely on this: in its regard we use precisely the models that are brought about by the reduction of the world to map, which is – as I have already said – the opposite of the globe. But if the world cannot be reduced to a map, i.e. in terms of space and time, in what terms is it still possible, for example, to speak of measurement? I am convinced that this question should not be eluded, even if I do not have a ready answer.

(...) The city is something that you can look at as a whole only on a map, which has boundaries only because it is the latter which gives it them. But we proceed with order. As surprising as this may seem, it has only been for a little over two centuries that the city is considered as an assortment of houses and roads, of houses and objects. At least up until the sixteenth century, on the contrary, it was seen as a group of men, as is shown, amongst others, by Torquato Tasso and the first author who in modern times reflects on the nature of the city, Giovanni Botero. Thus the city remained what it was for Aristoteles: a way that men have invented to be together and be better, therefore a style, a culture, a set of relational models, that whilst remaining specific, being unable to withdraw, as we are today

accustomed to considering normal, to a single location, but instead they existed according to their radius, wherever its citizens lived. If we take Genova, we note that in the fifteenth century, these relations affected the entire Mediterranean, in the sense that all important cities facing out onto the sea, from Constantinople on the Bosforo to Cadiz or Seville, had a “little Genova”, a Genovese district with its markets, houses and founders. And the same applied for all respectable Mediterranean cities, within which the different “nations”, as at the time they were called, lived in their districts, one alongside the other. Think today of Venice, where the various founders (Turks, Germans) retain their names within the citizen town names.

We have a topographic conception of the city, but only because there has been the modern, formidable reduction of the world to the map. As strange as it sounds, the first dictionary in which it is said that the city is still today what we – incorrectly – believe it is, i.e. a set of roads and homes, is the encyclopaedia. But if in the sixteenth century someone had said anything along those lines, they would not have been understood. Before encyclopaedias, the city, as I have already said, was a series of intangible models, a style, and on the contrary it became a set of houses, roads, walls only when the topographic, spatial model acquired the role of dominant model of all modernity. Globalisation is an event that pre-supposes a general “methanoia”: once this was what it was called and it worked, now it is called change of paradigm and it does not work. I prefer the first term, as it implies the awareness of having to implement a revolution, above all of one’s mental coordinates. I repeat: today it is no longer possible to count, in relation with reality, on the extremely powerful cartographic mediation which, reducing the terrestrial sphere to a flat, has thus far enabled us to avoid having to deal with the Earth as it truly is, with the globe. (F.Farinelli , http://www.mi.camcom.it/c/document_library/get_file?uuid=fdb9fb71-de3c-4048-a2f8-b99e7391ba4a&groupId=10157)

Original language:

"La storia della cartografia occidentale inizia proprio con immagini di città. Sono città, secondo la definizione appena enunciata, perché le immagini in questione sono il risultato di un processo di autorappresentazione, vale a dire perché il luogo raffigurato coincide con il luogo della produzione materiale dell'immagine e, soprattutto, del codice simbolico e ideativo di riferimento. Il Moderno inizia esattamente quando tale codice diventa geometrico: la “certezza del rappresentare”, cioè della riduzione del mondo a cartografia, è di natura esclusivamente topografica. Proprio perché questo codice non è più funzionalmente decisivo, possiamo oggi iniziarne la critica. Ma allo stesso tempo esso è ancora funzionante, almeno in un duplice senso.

Nella rete vive il paradosso del labirinto: puoi pensarlo, ma non rappresentarlo. Rappresentarlo significa dotarlo di un centro e quindi snaturarlo.

La mappa della rete è un non senso. Il modello del labirinto ci mostra i limiti della nostra cultura, abituata a far coincidere la conoscenza con la rappresentazione.

Credo che la difficoltà che abbiamo nel pensare la globalizzazione dipenda proprio da questo: noi adoperiamo nei suoi confronti esattamente i modelli che sono indotti dalla riduzione del mondo a mappa, che è – come ho già detto – l'opposto del globo. Ma se il

mondo non è riducibile a mappa, cioè in termini di spazio e di tempo, in quali termini è ancora possibile, per esempio, parlare di misurazione? Sono convinto che questa domanda non va elusa, anche se io non ho una risposta pronta.

(...) La città è qualcosa che puoi guardare per intero soltanto su una mappa, che ha i confini soltanto perché è quest'ultima che glieli fornisce. Ma procediamo con ordine. Per quanto sorprendente possa sembrare, soltanto da poco più di due secoli la città viene pensata come un assortimento di case e di strade, un insieme di case e oggetti. Almeno fino al Cinquecento essa, al contrario, era percepita come un insieme di uomini, e ne fanno fede tra gli altri Torquato Tasso e il primo autore che in epoca moderna riflette sulla natura della città, Giovanni Botero. In tal modo la città restava ciò che già era per Aristotele: una maniera che gli uomini avevano inventato per stare insieme e star meglio, dunque uno stile, una cultura, un complesso di modelli relazionali che pur rimanendo specifici non potevano restringersi, come oggi siamo abituati a ritenere normale, a un'unica località, ma invece esistevano in funzione del loro raggio, ovunque i suoi cittadini abitassero. Se prendiamo Genova, constatiamo che nel Quattrocento tali relazioni investivano l'intero Mediterraneo, nel senso che ogni importante città affacciata sul mare, da Costantinopoli sul Bosforo a Cadice o Siviglia, conteneva una "piccola Genova", un quartiere genovese con i suoi mercati, con le sue case, i suoi fondaci. E lo stesso valeva per ogni rispettabile città mediterranea, al cui interno le differenti "nazioni", come fin d'allora usava dire, abitavano nei propri rioni l'una accanto all'altra. Si pensi ancora oggi a Venezia, dove i diversi fondaci (dei turchi, dei tedeschi) conservano il proprio nome all'interno della toponomastica cittadina.

Noi abbiamo una concezione topografica della città, ma solo perché c'è stata la moderna, formidabile riduzione del mondo alla carta geografica. Per quanto strano sembri, il primo dizionario in cui si dice che la città è ancora oggi quella che – erroneamente – crediamo sia, cioè un insieme di strade e di case, è l'*Encyclopedie*. Ma se nel Cinquecento uno avesse detto una cosa del genere, non l'avrebbero capito. Prima dell'*Encyclopedie*, la città, come ho già detto, era una serie di modelli immateriali, uno stile, e diventa al contrario un insieme di case, strade, mura solo quando il modello topografico, spaziale, acquista il ruolo di modello dominante di tutta la modernità. La globalizzazione è una faccenda che suppone una generale "metanoia": una volta si chiamava così e funzionava, adesso si chiama cambiamento di paradigma e non funziona. Preferisco il primo termine perché implica la consapevolezza di dover attuare una rivoluzione soprattutto delle proprie coordinate mentali. Ripeto: oggi non è più possibile contare, nel rapporto con la realtà, sulla potentissima mediazione cartografica che, riducendo a un piano la sfera terrestre, ha fin qui permesso di evitare di fare i conti con la Terra così come essa davvero è, con il globo".

⁷ G.Astengo, "Il volto di Assisi", in Assisi, Piano Generale e Piani Particolareggiati di Primo Intervento, in *Urbanistica* 24,25, pag. 6

⁸ Adopted by resolution of the Municipal Council no. 96 of 22.07.10

⁹ Gaspar van Wittel or Vanvitelli – Prospective view of Urbino, seen from south-west, 1723

¹⁰ Piero Della Francesca, *Battesimo di Cristo, 1448-1450*. London, National Gallery, Sainsbury wing

¹¹ F.Farinelli, "La capriola del paesaggio":

"(...) Il paesaggio cioè è questione illimitata, la sua esistenza pone il problema di come possa darsi un insieme che sia allo stesso tempo visibile ma privo di confini e perciò non misurabile, e proprio per questo implica una difficoltà di oltremodo difficile soluzione: la questione della totalità. Il che vale intanto a distinguere il paesaggio stesso da tutti gli altri modelli (territorio, spazio) riferibili alla faccia della Terra, al contrario per natura delimitati, con i quali disinvoltamente e sbrigativamente si tende da qualche tempo a farlo coincidere. Sull'oggettiva attuale necessità della loro coincidenza si tornerà tra un momento. Ma se non si ha cura di separare fin dall'inizio il concetto di paesaggio da quello di spazio e territorio anche tale necessità diverrà incomprendibile. Paesaggio, territorio, spazio non sono insiemi di cose, ma modi di rappresentarsele. Nel linguaggio di Frege, dunque del fondatore della filosofia analitica contemporanea: essi non corrispondono al significato della Terra (che è la Terra stessa: il significato è la cosa) ma ai suoi sensi, alle differenti, specifiche maniere con cui la Terra si presenta, si dà. E ognuna di tali maniere dipende da una particolare intenzione, da una diversa forma di collettiva volontà storicamente determinata, obbedisce ad uno sguardo che afferma un altro progetto rispetto all'esistente. La mappa è il dispositivo della traduzione (e della trasformazione) del mondo nei termini della geometria classica, dello spazio. Al contrario il paesaggio corrisponde a tutto quello che sfugge a tale presa, a tale pretesa: a tutto ciò che del mondo la mappa non riesce ad afferrare e ridurre a sé, vale a dire ad esprimere sotto il profilo della separazione tra soggetto ed oggetto, mettendo tra loro distanza. Al riguardo si deve essere ancora più taglienti: soltanto il diaframma costituito dalla mappa consente la distinzione tra soggetto ed oggetto; al contrario il modello di paesaggio si fonda proprio sull'impossibilità di tale separazione, di tale distacco, sull'inesistenza di qualsiasi intervallo tra i due termini essenziali del processo conoscitivo.

(...) Questo perché nel 1969 è nata la Rete e, come ha spiegato Manuel Castells, quando diciamo "Rete" indichiamo un aggregato al cui interno è impossibile distinguere tra la macchina (l'*hardware*), l'intelligenza che essa incorpora (il *software*), e gli uomini e le donne addetti al loro funzionamento. Basta soltanto aggiungere che, proprio come il primo stadio humboldtiano della conoscenza, la forma di percezione che la Rete implica non comporta di conseguenza la distinzione cioè la distanza tra soggetto ed oggetto, proprio perché, esattamente come il paesaggio, il mondo della Rete è un mondo per eccellenza antikantiano, al cui interno cioè tempo e spazio non importano quasi più nulla, hanno quasi completamente smesso ogni loro funzione costitutiva. In sintesi: fin qui, o quasi, il modello della mente è stato la mappa, struttura limitata ma aperta, e tutta la modernità ha percepito e costruito il mondo a sua immagine e somiglianza, vale a dire spazialmente. Ma oggi la globalizzazione, attraverso il micidiale veicolo che è la Rete, costringe a riconoscere che il mondo non è una mappa ma una sfera, un globo appunto, la cui struttura, irriducibile a quella della mappa, è al contrario chiusa ma illimitata: il che significa anzitutto non soltanto che tra soggetto ed oggetto non vi è più distanza se non differenza, ma che ogni percezione del mondo è, proprio e soltanto come quella del paesaggio, concreta e consapevole immagine del "sensibile-infinito" come diceva Humboldt, del carattere cioè fatalmente incompleto di quel che vediamo, strutturalmente incompiuto di quel che sappiamo, programmaticamente partigiano (anche quando teso alla totalità) di quel che facciamo. Ai tempi di Humboldt la *dunstige Ferne*, la "nebulosa lontananza" che faceva oscillare l'orizzonte dei paesaggi, e che tanto affascina anche Goethe, era spia prima d'altro del mondo che restava da scoprire, ma

anche dell'incertezza delle vicende politiche tedesche, sospese tra riforme e rivoluzione. Oggi essa rimanda invece direttamente alla condizione sferica della forma del mondo, alla natura globale del suo funzionamento, che non sopporta più né la logica spaziale né l'angustia e la definizione connesse all'immagine cartografica.

Chi o che cosa ci impedisce a questo punto di pensare che il prossimo modello con cui ci rappresenteremo la mente sarà quello del paesaggio? Chi o che cosa ci impedisce a questo punto di pensare, perciò, che il prossimo modello con cui ci rappresenteremo la logica scientifica sarà il lavoro dell'artista, da sempre rivolto nella stessa direzione cui oggi punta il funzionamento del mondo: a mantenere aderente, se proprio tra essi deve esservi divario, il soggetto all'oggetto e viceversa?"

(source: <http://www.comune.modena.it>)

21. GENERAL CONCLUSIONS

21.1 The concept of HUL

The concept of **Historic Urban Landscape, HUL**, has its origins in the problems of controlling development in the surroundings of historic buildings or historic urban areas, recognized for their outstanding universal value, OUV.

One could mention the examples of Cologne Cathedral and the Historic Centre of Vienna, where high-rise development either outside or within the Buffer Zone threatened the OUV of the inscribed properties, i.e. the justification of the sites as World Heritage.

Consequently, in 2005, UNESCO collaborated with the City of Vienna to discuss the issue. Out of this context, there emerged the notion of HUL, which found its definition in the International Recommendation on HUL adopted by UNESCO in 2011.

It considers the historic city as a *living organism*, the result of a long stratification, which can adapt itself to the necessities of modern life, seen in a development perspective which should be based on the balance between *conservation and transformation*, the past and the future of historic urban landscape.

The concept of HUL as quoted in the UNESCO Recommendation is extremely wide, and it includes different terms linked with the conservation of the architectural and environmental heritage.

This definition extends the meaning to incorporate land use patterns, spatial organization, social and cultural values, visual relationships, topography and soils, vegetation, and all the elements of technical infrastructure.

It also includes the intangible dimension of heritage and the concepts of *cultural diversity and identity*.

Urban heritage, including its tangible and intangible components, constitutes in fact a key resource in enhancing the liveability of urban areas and sustaining productivity, in a changing global environment.

As the future of humanity hinges on an effective management of **resources**, conservation becomes a strategy to achieve balanced urban growth and quality of life. Historic Urban Landscape is defined to better tackle the contemporary socio-

economic transformations that do not respect the authenticity and integrity of historic cities and their landscape.

It provides general principles that acknowledge the continuous change in functional use and social structure as part of the city tradition, and suggests policies and strategies for proper planning processes with a close participation of the communities and groups of people involved in it.

The notion of 'Historic Urban Landscape' is not necessarily new, because the concepts characterising it can be found in old European theories and International documents.

What is new is the changed perception and the immense potential of this concept, the possibility of treating urban areas not as static objects of admiration but as living spaces for *sustainable communities*.

From the 2005 document of Vienna to the 2011 UNESCO Recommendation on HUL, and going through the several international debates concerning the topic of HUL, the approach to urban heritage conservation has been enriched with various significances which have deeply changed the disciplines and practices of urban heritage, thus gaining a wide and complex connotation.

The Recommendation contains an extensive and heterogeneous definition of the concept of HUL and shows how UNESCO has come to consider the historic city and urban landscape as a dynamic entity – and not a static one any longer – where development and conservation are supposed to supplement each other in a joint process which should provide appropriate tools and management plans.

21.2. HUL vs. Landscape and Cultural Landscape

In relation to the concepts of Landscape and Cultural Landscape, we can stress that **Historic Urban Landscape** is both a **Landscape**, perceived in its visual and aesthetic qualities, as well as a **Cultural Landscape**, recognized for its historical stratigraphy.

In a way, this brings HUL close to Cultural Landscape and in **relation to these two types of approaches, HUL represents an integration.**

The notion **of HUL** in fact is not limited to the physical and spatial organization of the urban territory and its surroundings; it can also refer to social and

cultural practices, economic processes, as well as other intangible dimensions of heritage.

In relation to the management of **Landscape**, the European Landscape Convention recognised the landscape has an important public interest role in the cultural, ecological, environmental and social fields, and constitutes a resource favourable to economic activity and whose protection, management and planning can contribute to job creation' and it stresses in particular the perception character of the landscape. It stresses in particular the perceptive character of the Landscape.

However, the **Cultural Landscape** is generally considered a clearly defined part of the territory, which is then subject to protective measures. **HUL**, instead, proposes an approach to the planning and management of the non-protected setting or surroundings of protected areas so as to mitigate the impact of possible negative developments and transformations for the benefit of the protected areas as part of larger territory.

It is important to notes that all these concepts (L, HUL, CL) can be there simultaneously in reference to the same place. What changes, as it has said, is the approach and the consequences in terms of planning and management.

Referring to the cities that are been object of the study, it can note that Assisi, for example, can be perceived as a **Landscape**: the *image* of Assisi seen from below, with the Subasio in the background, is still today the one reproduced by Niccolò Alunno in his "Gonfalone contro la Peste" (1468-70) or the one by Cipriano Piccolpasso in his "Descrizione dei caratteri multiformi del territorio storico della città". Today, as in the past, the whole city is developed around some axis of convergence, whose focus is the historic centre and in particular the ancient Hellenic central temple, later dilated into the triangular medieval pattern with the Rocca and its Franciscan basilicas below as cornerstones. Enclosed by its 14th century town walls, the city shows close functional, morphological and symbolical relations among its parts and between these and its territory, thus pointing out the essential structural and visual uniformity of the whole system.

Assisi can also be defined as a **Cultural Landscape** resulting from research in the history of the place: the territory is characterised by a long stratification of significances in the centuries, since the Late Neolithic period, continued until the Roman period, the Medieval Age and beyond.

Assisi is an **Historic Urban Landscape** that includes not only the cultural heritage of the walled city and surrounding territory, but which also includes the highest manifestations connected with the intangible heritage and spirituality.

Assisi can be seen in terms of a **HUL approach** to guarantee appropriate planning and management to vulnerable areas, i.e. in particular near the hamlets which are already seriously compromised significantly due to widespread, random urbanisation, accompanied by the ultimate objective of modernising the existing structures, with the aim of preserving the meaning of the historic city "as a whole".

The basis of course is to consider the historic city as a dynamic entity – and not a static one any longer – where people live every day and where development and conservation are supposed to supplement each other in a joint process which should provide appropriate tools and management plans.

21.3. Approaches to HUL, planning and management tools

While the notion of HUL has emerged from the World Heritage context, it is considered applicable to any heritage context and surroundings. In fact, the question in HUL should be about '**historic urban landscape approach**', which aims at preserving the *quality* of the human environment.

In Art. 11, the Recommendation on HUL, in fact, states: "*The historic urban landscape approach aims at preserving the **quality of the human environment**, enhancing the productive and sustainable use of urban spaces while recognizing their dynamic character, and promoting social and functional diversity. **It integrates the goals of urban heritage conservation and those of social and economic development.** (art. 11)"*

The scope of HUL is to propose a new approach for planning and management of urbanised territories, whether or not on the World Heritage List, so as to have some control over the continuity and change in the protected and the non-protected areas either within the urbanised territories or in their rural or natural surroundings.

“Urban landscape” can be seen as the built-anthropoc territory, which is characterized by on-going processes. Its management requires an accurate understanding of the causes and dynamics of development.

As far as “Historic Urban Landscape” is concerned, this can be seen as the recognition of specified **qualities** in historically perceived urban territories or sites, where the change can range from **static** to **dynamic**.

Historic Urban Landscapes are affected by a large array of new pressures, such as urbanization and globalization, which provide economic, social and cultural opportunities able to enhance the quality of life on the one hand, while on the other the unmanaged changes in urban density and growth can undermine the sense of place, the integrity of urban fabric and the identity of communities.

The definition of the Historic Urban Landscape has become necessary in order to better address the contemporary socio-economic transformations that do not respect the authenticity and integrity of historic cities and their landscape. This notion provides a framework for general principles that acknowledge continuous change in functions, uses and social structures as part of urban tradition, and it offers policies and strategies for proper planning processes involving a close participation of communities and groups of people.

The HUL approach aims at managing the development of historic cities to contribute to the well-being of communities and to the conservation of historic urban areas and their cultural heritage while ensuring economic and social diversity and residential functions.

Historic Urban Landscapes often refer to relatively large territories. Consequently, there will be need for a number of different planning and management instruments. HUL may contain protected historic buildings, urban or rural conservation areas, as well as protected natural environments. There can also be important vistas and panoramas which refer to areas beyond the administrative competence of a community.

The definition and implementation of HUL would be mainly based on the existing and/or newly created planning and management instruments. HUL would not be just another master plan, but rather it should offer a general policy reference for safeguarding and integrated development policies and strategies.

Information management and an effective monitoring system of the decision-making processes at all levels are crucial.

The creation of safeguarding measures, land-use planning and management, which could be carried out within the frameworks of existing instruments, are all important.

The recognition of HUL will most probably require some additional information and management measures, which should be taken care of, and the results integrated into the relevant instruments. Consequently, we can suppose that once HUL is recognised, it will become an overall management framework.

In the end, a wide education and awareness of the conservation of heritage are fundamental.

The fact that historic cities are living cities calls for an active participation of the local population, for whom these spaces hold special significance. It is also clear that historic areas are essentially entities that go through continual processes of transformations, and multi-disciplinary actions should be undertaken to check these changes.

The fundamental task of HUL - together with its conservation and management - is to maintain and restore the spirit and character of cities perceived in relation to their resources, sense of identity and collective memory embodied in the structural permanencies.

The study of the past history of cities, of their transformations throughout time, of their past and present critical aspects in management systems, as well as of their resources, is necessary to understand how it is possible to manage transformations in historic urban landscape, in the respect of the conservation of the qualities and significances of the cities themselves.

HUL recognises the quality of the wider urban landscape, not only the one inserted within protected areas. HUL is not to be taken as another World Heritage category.

The fundamental goal is that of considering the historic city as a site and not as a set of buildings.

The fundamental goal of the approach to HUL is the extension of the concept of "conservation", insofar as the object of HUL is to guarantee the proper conservation/safeguarding of historic urban areas that are an integral part of the overall urban landscape as it has evolved over time (the city as a "whole").

This is why the goal to the conservation of HUL is to put more attention to the environmentally sustainable management and controlled development of areas forming the context/setting for the significant historic areas, with the aim of preserving the meaning of the entire historic city, and not just the historic centre, which is often sufficiently protected by town planning instruments, but which often

"suffers" uncontrolled development of the areas adjacent to it, resulting in negative effects that are mirrored on areas containing the "heart" of the whole city's meaning.

HUL will not be just another master plan, but rather it should offer a general policy reference for safeguarding and integrated development policies and strategies.

21.4. The methodological approach to the conservation of HUL

Research suggests a methodological approach regulating the possibility of conservation/development of historic urban landscapes so that they do not lose the qualities and the historical significance of the place, in line with what is contained in the 2011 UNESCO Recommendation on HUL.

The proposed methodological approach is based on the study both of the *significance* of cities and of their *qualities and common resources*.

In this way, this approach should provide a general framework and it can be used as a reference model for monitoring and management of continuity and change in historic urban areas and their surroundings.

The proposed model would also be the base for the development of further models, especially through its capacity for continual evolution and particularly by integrating innovations in the managing of urban areas.

The approach constitutes the first start point for the control of the aspects related to the conservation and development of historic urban landscapes.

It is based on the Draft Action Plan of the 2010 Draft UNESCO Recommendation on HUL, which contains 6 critical steps aiming at a control of the transformation and conservation of Historic Urban Landscapes.

These steps point out the need to undertake comprehensive surveys and the mapping of the city resources, to reach consensus with stakeholders, to assess the vulnerability of the city resources, to integrate urban heritage values and their vulnerability status into a wider framework of city development, to prioritize action for conservation and development and to establish appropriate partnerships and local-management frameworks.

The proposed methodological approach to manage Historic Urban Landscapes is a multidisciplinary study that includes some disciplines, i.e. Conservation theories, Architecture, History of art, Urbanism, Sociology, Economy and culture, Evaluation systems.

It includes a preliminary study of the significance of the cities: their history and development of the urban form, the cultural heritage, and the old and current protection plans of the cities. Here, the study of ancient maps, cartography and historical iconography is essential in order to understand the city's significance, and to define exactly **what** the resources are and **why** they are important. Another key element is the study and analysis of the past and present city protection tools, which, as a general rule, describe the current conditions in greater or lesser detail and regulate future transformations.

The study of the international doctrine relative to the conservation of historic areas and landscapes, the study of conservation theories and the history of town planning, and, finally, the UNESCO Recommendation on HUL and its Action Plan, have resulted in the analysis of the HUL of the three Italian cities, and in the consequent drafting of a methodological approach for the planning and management of HUL.

The approach aims to identify the resources of HUL, their **importance**, their **vulnerability** and their **possibility of change** within the whole of the historic city, with a view to **overall balancing** the development and conservation parameters throughout the territory.

In this sense, the approach to the conservation of HUL aims to construct a "map of intensity" and a "map of vulnerability" of the different parts of the territory concerned, taking into account the previous analyses.

The aim is to identify the areas where resources "are of greater weight" with respect to the areas where they are of lesser weight. In this way, it is possible to identify the most vulnerable areas and contribute to planning the city's sustainable development in the future.

The aim is to search for a future development scenario that would take into account the **quality** of the place, and the **importance** and **vulnerability** of the different parts of the territory, in order to create a City Conservation/City Development strategy that preserve the significance of the HUL.

The final goal is the **Draft on General Guidelines for the Conservation of Historic Urban Landscapes**, as described in the following pages.

22. GENERAL GUIDELINES TO THE CONSERVATION OF HISTORIC URBAN LANDSCAPES

The General Guidelines to the Conservation of Historic Urban Landscapes include 17 critical steps, as follows:

1. Identification of the Significance of HUL

- study of the history of the territory;
- evolution of the historic city throughout time;
- stratification of “significance layers” of the historic city;
- study of the cultural heritage (tangible and intangible).

2. Spotting of the "study area"

3. Spotting of the area inscribed on the World Heritage List (if it is a UNESCO site)

4. Study of past general protection laws

5. Study of existing general protection laws

6. Identification and study of the general resources of the area:

6.1. identification/description of the resources:

- historical-architectonical-cultural resources
- landscape resources
- natural resources
- ecological resources
- socio -economic resources
- tourist resources
- symbolic resources
- historical resources
- archaeological resources
- cultural resources
- other resources of HUL
- resources linked to the intangible heritage

6.2 description of the importance of the resources within the whole context of the area

6.3 description of the vulnerability of the resources

6.4 description of the opportunities of change of the areas

- 7. division of the territory into macro-areas, similar as for resources**
- 8. definition of the intensity of resources in macro areas according to well-defined standards of evaluation (see chart below)**
- 9. draft of an intensity plan/vulnerability plan in order to identify the areas where it is possible to define a possible development and the areas in which safeguard is necessary**
- 10. draft on an intensity model/vulnerability model**
- 11. check on restrictions and the existing planning in the surroundings**
- 12. draft of a “city development strategy” (CDS) or a “city conservation strategy” (CCS) including:**
 - A) strictly no-go areas;
 - B) sensitive areas that require careful attention to planning, design and implementation;
 - C) opportunities for development (in particular among high-rise constructions);
- 13. definition of priority actions for conservation/development**
- 14. establishing the appropriate partnership and local management frameworks for each of the identified projects for conservation and development in the CDS/CCS, as well as developing mechanisms for the coordination of the various activities between different actors, public and private**
- 15. raising awareness through some meetings between people and local authorities**
- 16. creation of web sites and other possibilities to spread information**
- 17. establishment of periodical reports on the state of conservation/development of the areas**

STANDARDS OF EVALUATION

(Ref. ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties)

- **IMPORTANCE OF RESOURCES:**

- Very High 5
- High 4
- Medium 3
- Low 2
- Negligible 1
- Unknown 0

1. Inscription on the World Heritage List

area wholly inscribed on the core zone	Very High	5
area partly inscribed on the core zone and partly on the buffer zone	High	4
area wholly inscribed on the buffer zone	Medium	3
area partly inscribed on the buffer zone and partly out of it	Low	2
area not inscribed on the WHL	Negligible	1
Unknown area	Unknown	0

2. Protected areas

area wholly inscribed on 4 safeguard areas	Very High	5
area inscribed wholly/partially on 4 safeguard areas	High	4
area inscribed on 3 safeguard areas	Medium	3
area inscribed on 2 safeguard areas	Low	2
area inscribed on 1 safeguard area	Negligible	1
Unknown area	Unknown	0

3. Historic-cultural resources

Area with exceptional historic-cultural resources (Basilica of S.Francesco, Basilica of S.Chiera, Major fortress, temple of Minerva, Porziuncola)	Very High	5
Area with high historic-cultural resources (Eremi and other minor churches)	High	4
Area with medium historic-cultural resources (minor architectonic landmarks: churches, castles, monasteries etc.)	Medium	3
Area with low historic-cultural resources (scattered buildings)	Low	2
Area with negligible historic-cultural resources (scattered buildings containing items of particular importance)	Negligible	1
Area without any historic-cultural resources	Unknown	0

4. Landscape resources

Area with exceptional landscape resources	Very High	5
Area with high landscape resources	High	4
Area with medium landscape resources	Medium	3
Area with low landscape resources	Low	2
Area with negligible landscape resources	Negligible	1
Unknown area	Unknown	0

5. Physical/natural resources

Area with exceptional physical/natural resources (SIC)	Very High	5
Area with high physical/natural resources	High	4
Area with medium physical/natural resources	Medium	3
Area with low physical/natural resources	Low	2
Area with negligible physical/natural resources	Negligible	1
Unknown area	Unknown	0

6. Ecological resources

Area wholly inserted on the most significant ecosystems	Very High	5
Area partly inserted on the primary ecological paths and partly inserted on the secondary ecological paths	High	4
Area wholly inserted on secondary ecological paths	Medium	3
Area partially inserted on secondary ecological paths	Low	2
Area on minor ecological paths	Negligible	1
Unknown area	Unknown	0

7. Symbolical resources

Area with exceptional symbolical resources	Very High	5
Area with high symbolical resources	High	4
Area with medium symbolical resources	Medium	3
Area with low symbolical resources	Low	2
Area with negligible symbolical resources	Negligible	1
Unknown area	Unknown	0

8. Socio - economic resources

Area with exceptional socio-economic resources (production of DOC wine, olive groves etc.)	Very High	5
Area with high socio-economic resources	High	4
Area with medium socio-economic resources, without particular fine productions	Medium	3
Area with low socio-economic resources	Low	2
Area with negligible socio-economic resources	Negligible	1
Unknown area	Unknown	0

9. Pilgrimage and tourist resources

Area with exceptional tourist resources	Very High	5
Area with high tourist resources	High	4
Area with medium tourist resources	Medium	3
Area with low tourist resources	Low	2
Area with negligible tourist resources	Negligible	1
Unknown area	Negligible	0

10. Visual integrity

Unspoiled area from the visual point of view	Very High	5
Area showing some variations from the visual point of view	High	4
Area showing some moderate variations from the visual point of view	Medium	3
Area showing high variations from the visual point of view	Low	2
Area highly damaged from the visual point of view	Negligible	1
Unknown area	Negligible	0

11. Other resources linked to HUL

- **POSSIBILITY OF CHANGE OF THE AREAS:**

- Unknown 0
- No change 1
- Negligible change 2
- Minor change 3
- Moderate change 4
- Major change 5

The possibility for change of each resource is in relation to the vulnerability.

This status is related to:

- the lack of protection laws
- the inadequacy of protection laws
- the particular conformation of the territory
- the particular anthropic pressure in the territory

23. GENERAL BIBLIOGRAPHY

Protection of the cultural heritage - International Doctrine

- Council of Europe 1969, European Convention on the Protection of the Archaeological Heritage (6 May 1969) (No. 66)
- Council of Europe 1975, European Charter of the Architectural Heritage (Adopted on 26 September 1975)
- Council of Europe, 1975, Declaration of Amsterdam (Congress on the European Architectural Heritage, Amsterdam, 21-25 October 1975)
- Council of Europe 1976, Resolution (76) 28 (adopted 14 April 1976) concerning the adaptation of laws and regulations to the requirements of integrated conservation of the architectural heritage
- Council of Europe 1985, Convention for the Protection of the Architectural Heritage of Europe (3 October 1985) (No. 121)
- Council of Europe 1985, European Convention on Offences relating to Cultural Property (23 June 1985) (No. 119)
- Council of Europe 1985, Resolutions of the 2nd European Conference of Ministers responsible for the Architectural Heritage (Granada, 3-4 October 1985). [MPC (91) 9]
- Council of Europe 1986, Recommendation No. R (86) 11 of the Committee of Ministers to member States on urban open space
- Council of Europe 1989, Recommendation No. R (89) 5 of the Committee of Ministers to member States concerning the protection and enhancement of the archaeological heritage in the context of town and country planning operations
- Council of Europe 1991, Recommendation No. R (91) 13 of the Committee of Ministers to member States on the protection of the twentieth-century architectural heritage
- Council of Europe 1992, European Convention on the Protection of Archaeological Heritage (revised) (16 January 1992) (No. 143)
- Council of Europe 1993, Recommendation No. R (93) 9 of the Committee of Ministers to member States on the protection of the architectural heritage against natural disasters
- Council of Europe 1995, Recommendation No. R (95) 9 of the Committee of Ministers to member States on the integrated conservation of cultural landscape areas as part of landscape policies
- Council of Europe 1996, Recommendation No. R (96) 6 of the Committee of Ministers to member States on the protection of the cultural heritage against unlawful acts
- International Museums Office, 1931, Athens Charter for the Restoration of Historic Monuments (First International Congress of Architects and Technicians of Historic Monuments, Athens, 1931)
- ICOMOS 1964, International Charter for the Conservation and Restoration of Monuments and Sites, (The Venice Charter)
- ICOMOS Symposium, 1972, Resolutions of the Symposium on the Introduction of Contemporary Architecture into Ancient Groups of Buildings
- ICOMOS Symposium, 1967, Norms of Quito (Final Report of the Meeting on the Preservation and Utilization of Monuments and Sites of Artistic and Historic Value, Quito)
- ICOMOS Symposium, 1982, Declaration of Dresden

- ICOMOS 1982, The Florence Charter, Historic Gardens and Landscapes,
- ICOMOS 1987, Charter on the Conservation of Historic Towns and Urban Areas
- ICOMOS Nat. Com. Brazil, 1987, Principles declared by the First Brazilian Seminar About the Preservation and Revitalization of Historic Centers
- ICOMOS 1990, Charter for the Protection and Management of the Archaeological Heritage
- ICOMOS Nat. Com. USA, 1992, A Preservation Charter for the Historic Towns and Areas of the United States of America (US/ICOMOS)
- ICOMOS, ICCROM, UNESCO Symposium, 1994, The Nara Document on Authenticity (Nara Conference on Authenticity in Relation to the World Heritage Convention, Nara, Japan, 1-6 November 1994; adopted by ICOMOS in 1999)
- ICOMOS Symposium, 1996, Declaration of San Antonio at the Inter-American Symposium on Authenticity in the Conservation and Management of the Cultural Heritage
- ICOMOS Nat. Com. Australia, 1999 (1st ed. 1979), The Australia ICOMOS Charter for the Conservation of Places of Cultural Significance (The Burra Charter)
- UNESCO 1954, Convention for the Protection of Cultural Property in the Event of Armed Conflict (the 'Hague Convention'), with Regulations for the Execution of the Convention, as well as the Protocol to the Convention and the Conference Resolutions, 14 May 1954
- UNESCO 1962, Recommendation concerning the Safeguarding of the Beauty and Character of Landscapes and Sites, 11 December 1962
- UNESCO 1972, Recommendation concerning the Protection, at National Level, of the Cultural and Natural Heritage, 16 November 1972
- UNESCO 1976, Recommendation concerning the Safeguarding and Contemporary Role of Historic Areas, 26 November 1976

Historic Urban Landscape

- International Conference "World Heritage and Contemporary Architecture – Managing the Historic Urban Landscape", Vienna, 2005
- Declaration on the Conservation of Historic Urban Landscapes. Paris, UNESCO Headquarters, 10-11 October 2005
- ICOMOS Xi'An Declaration on the Conservation of the setting of heritage structures, sites and areas, Xi'An, China, 21 October 2005
- Workshop on New Approaches to Urban Conservation, Jerusalem, 4- 6 June 2006
- Management and Preservation of Historic Centres of Cities inscribed on the World Heritage List, St. Petersburg, 2006
- Regional Conference "Historic Urban Landscapes in the Americas", Olinda, November 2007
- ICCROM Seminar on "World Heritage and Contemporary Architecture and Development: Management of the Historic Urban Landscape in the Baltic Countries", Vilnius, Lithuania, 7-8 December 2006
- (Executive Board 179EX/25) Paris, 7 March 2008: Proposal by the General Director for the preparation of a revised Recommendation Concerning the Safeguarding and Contemporary Role of Historic Areas

- Workshop on the Application of the concept of Historic Urban Landscapes in the African context, Zanzibar, Tanzania, Nov. 30, -Dec.3, 2009. Zanzibar Recommendation on the Application of the Concept of the Historic urban Landscape in the African Context.
- Preliminary study on the technical and legal aspects relating to the desirability of a standard-setting instrument on the conservation of the historic urban landscape. Paris, 20 March 2009 (Executive Board 181EX/29)
- Preliminary study on the technical and legal aspects relating to the desirability of a standard-setting instrument on the conservation of the historic urban landscape. General Conference 35th Session, Paris, 27 July 2009
- 2008, 179th session of the Executive Board "Proposal by the Director-General for the preparation of a revised Recommendation concerning the safeguarding and contemporary role of Historic Areas " (179 EX/Decision 25)
- 2009, 181st session of the Executive Board "Full preliminary study of the technical and legal aspects of a of a revised recommendation concerning the safeguarding and contemporary role of historic areas " (181EX/Decision 29)
- 2009, 35th session of the General Conference "Preliminary study on the technical and legal aspects relating to the desirability of a standard-setting instrument on the conservation of the historic urban landscape " (35C / Resolution 42)
- 2010, 185th session of the Executive Board "Invitations to the Intergovernmental Meeting of Experts (category II) related to a Draft recommendation on the conservation of the historic urban landscape " (185EX/Decision 46)
- 2011, 36th session of the General Conference "Proposals concerning the desirability of a standard-setting instrument on historic urban landscapes"
- 2010, Preliminary report on the draft Recommendation on the Historic Urban Landscape
- 2011, Report and revised text of the draft Recommendation on the Historic Urban Landscape

Conservation of urban areas

- Standard-setting in UNESCO Vol. II - *Conventions, Recommendations, Declarations and Charters adopted by UNESCO (1948-2006)* - UNESCO Publishing, 2007
- UNESCO, 2011, *Operational Guidelines for the Implementation of the World Heritage Convention*, World Heritage Committee and World Heritage Centre
- *What is OUV? Defining the OUV of Cultural World Heritage Properties*, an ICOMOS study compiled by Jukka Jokilehto, ICOMOS, 2008
- ICOMOS, 2004. *The World Heritage List, Filling the Gaps – an Action Plan for the Future*, An Analysis by ICOMOS (to be revised and printed in 2005)
- *Values and Criteria in Heritage Conservation*. Proceedings of the International Conference of ICOMOS, Florence, 2007
- *KRAKÓW Charter 2000, Principles for Conservation and Restoration of Built Heritage*, International Conference On Conservation, KRAKÓW 2000
- *World Heritage Cultural Landscapes 1992-2002* - World Heritage Papers nr.6, 2003
- *Cultural Landscapes: the Challenges of Conservation* - World Heritage Papers nr.7, November 2002
- *Linking universal and local values*, Amsterdam - World Heritage Papers nr.13, 22-24 May 2003

- *World Heritage and Buffer Zones*, World Heritage Papers nr. 25, March 2009
- *Managing Historic Cities* - World Heritage Papers nr. 27, September 2010
- *World Heritage Cultural Landscapes*- World Heritage Papers nr. 26, December 2009
- K.Taylor, Jane L.Lennon, *Managing Cultural Landscapes*, Routledge, Great Britain, 2012
- J. Jokilehto, *A History of Architectural Conservation*, Butterworth-Heinemann, Oxford, 1999
- M. Heidegger, *The Origin of the Work of Art*, in: M. Heidegger, *Basic Writings*, edited by D. Farrel Krell, Routledge, London, 1993, pp. 143-212
- Cesare Brandi, *Theory of Restoration*, translated by C. Rockwell, Nardini Editore, Florence
- G.Carbonara, *Atlante del Restauro*, UTET Scienze Tecniche, Torino, 2004
- ICCROM Working Group, *Definition of Cultural Heritage* selected by. J.Jokilehto, January 2005
- Statement of Cultural values and Heritage Impact Assessment, Commonwealth Historic Resource management Limited, September 2010
- 2011 ICOMOS Guidance on Heritage Impact Assessments for Cultural World Heritage Properties
- Simon, H. S. 1969, *The sciences of the artificial*, Cambridge: MIT Press.
- Staniforth, S. 2000, *Conservation: significance, relevance and sustainability*, IIC Bulletin,(6), 3–8.
- Stovel, H. 2008. *Effective use of authenticity and integrity as world heritage qualifying conditions*. *City & Time* 2 (3): 3, 2008. Available: www.ct.ceci-br.org.
- *La conservazione dell'autenticità negli interventi sul costruito a Venezia*, edited by Emma Calebich, Aracne Editrice srl, Roma, 2009

Urbanism, landscape, cartography and history of cities

- G.Cullen, *Townscape*, London, 1961
- E.Turri, *Il paesaggio come teatro*, Venezia, 2003
- K. C. Ryden, *Mapping the Invisible Landscape. Folklore, Writing and the Sense of Place*, Iowa City, 1993
- D. Cosgrove, *Social Formation and Symbolic Landscape*, London, 1984
- J.W.Goethe, *Viaggio in Italia*, by E.Castellani, Milano, 1993
- Tosco, *Il castello, la casa, la chiesa. Architettura e società nel medioevo*, Torino, Einaudi, 2003
- Tosco, *Il paesaggio come storia*, Bologna, Il Mulino, 2007
- Tosco, *Il Paesaggio storico. Le fonti e i metodi di ricerca tra medioevo ed età moderna*, Roma-Bari, Laterza, 2008
- Fabrizio Toppetti, *Paesaggi e città storica*, Alinea Editrice, 2011
- J. Schulz, *La cartografia tra scienza e arte. Carte e cartografi nel Rinascimento italiano*, Modena 1990
- Casti, *L'ordine del mondo e la sua rappresentazione. Semiosi cartografica e autoreferenza*, Milano 1998
- *La galleria delle carte geografiche in Vaticano*, edited by L. Gambi, A. Pinelli, Modena

1993-94

- L. Nuti, *Ritratti di città. Visione e memoria tra Medioevo e Settecento*, Venezia 1996
- L. Nuti, *Cartografie senza carte: lo spazio urbano descritto dal Medioevo al Rinascimento*, Jaca Book, Perugia, 2008
- *L'Europa moderna. Cartografia urbana e vedutismo*, edited by C. De Seta, D. Stroffolino, Napoli 2001
- D. Friedman, *Percezione e rappresentazione dello spazio dall'architettura fortificata al disegno urbano*, in Fortezze d'Europa. Forme, professioni e mestieri dell'architettura difensiva in Europa e nel Mediterraneo spagnolo, Atti del Convegno Internazionale, Roma 2003
- *The History of Cartography*, edited by J.B. Harley, D. Woodward, Chicago and London (vol. 3)
- J. B. Jackson, *Discovering the Vernacular Landscape*, Yale University Press, 1984
- Lucio Gambi, *Una geografia per la storia*, Torino, 1973
- Claude Raffestin - *Zu Einer Geographie Der Territorialitat 2010*, Franz Steiner Verlag Wiesbaden GmbH
- Franco Farinelli, *I segni del mondo. Immagine cartografica e discorso geografico in età moderna*, Academia Universa Press, 2009
- Franco Farinelli, *La crisi della ragione cartografica*, Einaudi, 2009
- Franco Farinelli, *Geografia, un'introduzione ai modelli del mondo*, Piccola Biblioteca Einaudi, Torino, 2003
- Anderson, B. 1998. *The Importance of Cultural Meaning in Defining and Preserving Sense of Place*. In: Tomlan, M. (ed.). *Preservation of what, for whom? A critical look at significance*. Ithaca: National Council for Preservation Education, p. 127-135.
- *Rappresentare la città. Topografie urbane nell'Italia di antico regime*, edited by M. Folin, Reggio Emilia 2010
- P. Zumthor, *La misura del mondo. La rappresentazione dello spazio nel Medio Evo*, (Paris 1993) Bologna 1995
- *A volo d'uccello. Jacopo de' Barbari e le rappresentazioni di città nell'Europa del Rinascimento*, catalogo della mostra, Venezia 1999
- D. Stroffolino, *La città misurata. Tecniche e strumenti di rilevamento nei trattati a stampa del Cinquecento*, Roma 1999
- *L'Europa moderna. Cartografia urbana e vedutismo*, edited by C. De Seta, D. Stroffolino, Napoli 2001
- *Imago urbis. L'immagine della città nella storia d'Italia*, edited by F. Bocchi, R. Smurra, Atti del convegno internazionale, Bologna, 5-7 settembre 2001, Roma 2003
- *Tra oriente e occidente. Città e iconografia dal XV al XIX secolo*, edited by C. De Seta, Napoli 2004
- *Città allo specchio*, edited by C. Conforti, L. Nuti, C.M. Travaglini, "Città e Storia", a. I, n. 2, luglio-dicembre 2006
- *Spazio, potere e rappresentazione*, «Storicamente», 3, 2007
- *Cartografi veneti. Mappe, uomini e istituzioni per l'immagine e il governo del territorio*, edited by V. Valerio, Padova 2007
- U. Lingren, *La cartografia, in Il Rinascimento italiano e l'Europa*, vol. III, Produzione e tecniche, edited by P. Braunstein, L. Molà, Fondazione Cassamarca, Treviso 2007, pp. 367-385

- M. Borgherini, *Disegno e progetto nel cantiere medievale: esempi toscani del XIV secolo*, Venezia, Marsilio, 2001
- B. Secchi, *Primeira Lição de Urbanismo. São Paulo: Perspectiva*, 2006
- D. Calabi, *Storia dell'urbanistica europea*, Bruno Mondadori, 2008
- D. Calabi, *La città del primo Rinascimento*, Editori Laterza, Bari, 2008
- D. Calabi, *Storia della città. L'età moderna*, Venezia, Marsilio, 2009 (Marsilio 2001)
- D. Calabi, *Storia della città. L'età contemporanea*, Venezia 2005
- *Il Rinascimento italiano e l'Europa (Luoghi, spazi, architetture)*, edited by D. Calabi, E. Svalduz, Vicenza, Angelo Colla Editore, 2010
- E. Turri, *La megalopoli padana*, Venezia 2000
- Zucconi, *La città dell'Ottocento*, Roma-Bari 2001
- B. Secchi, *La città del ventesimo secolo*, Roma-Bari, 2005
- Grohmann, *La città medievale*, Roma-Bari, Laterza, 2003
- F. Bocchi, M. Ghizzoni, R. Smurra, *Storia delle città italiane*, UTET Università, 2006
- L. Benevolo, *La città e l'architetto*, Universale Laterza, Bari, 1984
- P. Falini, F. Ciardini, *L'analisi dei centri storici: manuale per la formazione degli strumenti d'intervento urbanistico*, Roma, Officina, 1981
- C. L. Frommel, *Architettura del Rinascimento italiano*, Milano, Skira, 2009
- L.H. Heydenreich, *Architecture in Italy 1400-1500*, revised by P. Davies, New Haven-London, Yale University Press, 1996
- W. Lotz, *Architettura in Italia 1500-1600*, edited by D. Howard, Milano, Rizzoli, 1997
- *L'ambizione di essere città. Piccoli, grandi centri nell'Italia rinascimentale*, edited by E. Svalduz, Venezia, Istituto Veneto di Scienze, Lettere ed Arti, 2004
- C. Conforti, *La città del tardo Rinascimento*, Roma-Bari, Laterza, 2005
- P. Bairoch, *Storia delle città. Dalla proto-urbanizzazione all'esplosione urbana del Terzo Mondo*, Milano 1992
- J. Heers, *La città nel Medioevo in Occidente. Paesaggi, poteri e conflitti*, trad. it edited by M. Tangheroni, Milano 1995 (ed. orig.: Paris 1990)
- *Fabbriche, piazze, mercati. La città italiana nel Rinascimento*, edited by D. Calabi, Roma 1997
- G.P. Brogiolo, S. Gelichi, *La città nell'alto medioevo italiano. Archeologia e storia*, Roma-Bari 1998
- *I luoghi degli stranieri nella città italiana*, edited by D. Calabi, P. Lanaro, Bari-Roma 1998;
- N. Pevsner, J. Fleming, H. Honour, *Dizionario di architettura*, Torino, Einaudi, 1981
- J. Summerson, *Il linguaggio classico dell'architettura*, Torino, Einaudi, 2000
- *Storia visiva dell'architettura italiana. 1400-1700*, edited by M. Savorra, Milano, Electa, 2007
- K. Lynch, *The image of the city*, Cambridge, Mass., 1960
- F. Choay, *La regola e il modello: sulla teoria dell'architettura e dell'urbanistica*, Roma 1986 (orig.: Paris 1980)
- Finotto, *La città chiusa*, Venezia 1992
- R. Pavia, *L'idea di città. Teorie urbanistiche della città tradizionale*, Milano 1994
- *Teoria dell'architettura. 117 trattati dal Rinascimento a oggi*, introduzione di C. Thoenes, Koln 2003

- Modelli di città. *Strutture e funzioni politiche*, edited by P. Rossi, Torino 1987
- Settis Salvatore, *Paesaggio Costituzione cemento. La battaglia per l'ambiente contro il degrado civile*, Einaudi, Torino, 2010
- Storia dell'architettura italiana. Il Quattrocento, edited by F.P. Fiore, Milano, Electa, 1998
- Storia dell'architettura italiana. Il primo Cinquecento, edited by A. Bruschi, Milano 2002
- Storia dell'architettura italiana. Il secondo Cinquecento, edited by C. Conforti, R. Tuttle, Milano, Electa, 2001
- D. Friedman, *Florentine New Towns. Urban Design in the Late Middle Ages*, Cambridge University Press, 1988 (trad. it.: Terre Nuove. La creazione delle città fiorentine nel tardo medioevo, Torino 1996)
- M. Tafuri, *Ricerca del Rinascimento. Principi, città, architetti*, Torino

- R. Pavia, *Le paure dell'urbanistica. Disagio e incertezza nel progetto della città contemporanea*, Genova 1996
- B. Secchi, *Prima lezione di urbanistica*, Roma-Bari 2000
- Paola Di Biagi, Patrizia Gabellini (edited by) *Urbanisti italiani: Piccinato, Marconi, Samonà, Quaroni, De Carlo, Astengo, Campos Venuti*, Laterza, Bari 1992
- Francesco Indovina (edited by), *La ragione del piano. Giovanni Astengo e l'urbanistica italiana*, Franco Angeli, Milano 1991
- Giovanni Astengo. *Un metodo per dare rigore scientifico e morale all'urbanistica*, in *Urbanisti italiani*, edited by P. Di Biagi e P. Gabellini, Roma-Bari, Laterza, 1992
- B. Secchi, *Giovanni Astengo e la costruzione della pratica urbanistica*, in *Casabella* nr. 572, October 1990
- Paola Di Biagi, edited by, *I classici dell'urbanistica moderna*, Donzelli Editore, 2002
- G. Astengo, *Urbanistica*, in *Enciclopedia Universale dell'Arte*, vol. XIV, Venezia, Sansoni, 1966
- G. Astengo, *Piano generale e piani particolareggiati di primo intervento*, in *L'Urbanistica* 24-25, 1958
- G. Astengo, *I piani urbanistici vanno rifatti*, in *Le conferenze dell'Associazione Culturale Italiana*, vol. 18, 1965-1966
- G. Astengo (edited by), *La situazione urbanistica e il turismo in Umbria*, 1958
- G. Astengo, *Piano Regolatore Generale di Assisi*, in *L'Architettura, Cronache e Storia*, 1962 (VIII, 492)
- G. Astengo, *Per un sistema informativo a servizio delle politiche territoriali delle Regioni*, in *Regione Piemonte*, 26-27 marzo 1979
- G. Astengo, *Piano urbanistico e piano conoscitivo di un centro storico. Assisi: un'esperienza in atto*. Bollettino nr. 185, marzo 1980
- G. Astengo, *Piano Regolatore Generale e Piani generali di primo intervento*, Comune di Assisi, Agosto 1955 (1)
- G. Astengo, *Piano Regolatore Generale e Piani generali di primo intervento*, Comune di Assisi, Agosto 1955 (2)
- G. Astengo, *La costruzione dell'unità metropolitana*, in *Quaderni di Urbanistica e Informazioni*, gennaio-febbraio 1990
- G. Astengo, *Raccolta di articoli (1 serie)*, 1942-1954
- G. Astengo, *Town and regional planning in Italy*, Edited at the Department of Civil

- degnign, University of Liverpool, July 1952
- G.Astengo, *Tutela e valorizzazione dei beni culturali ambientali*, Casa Editrice Colombo, Roma, 1967
 - G. De Carlo, *Immagini e frammenti*, Electa, 1966
 - Giancarlo De Carlo, *Un nuovo piano per Urbino* in *Urbanistica* nr. 102, 1994
 - Urbino, *ricerche preliminari alle varianti al PRG e agli strumenti attuativi* . First phase. IUAV, 1980, edited by Ruggero Faccin e Eleonora Mantese
 - G.De Carlo: *Urbino General Plan*, 1966 - 1994
 - Stefano G.Azzarà, *Politica, progetto, piano*, Cattedrale, Ancona, 2009
 - G. De Carlo, *Urbino, la storia di una città e il piano nella sua evoluzione urbanistica*, Marsilio Editori Padova, 1966
 - G.De Carlo, *Questioni di architettura e urbanistica*, Urbino, Argalia, 1964
 - Carlo Bo, *Dove vive Urbino*, Domus 364, 1960

Assisi

- A.Grohmann, *Le città nella storia d'Italia. Assisi*. Editori Laterza, 1989
- P.Falini, *Il territorio storico di Assisi*, in *Rassegna di Architettura e Urbanistica* nr. 86-87, 1997
- Brizi A., *Dalla Rocca di Assisi, insigne monumento Nazionale di Architettura*. Studi storico illustrativi compilati per commissione dell'Accademia Propeziana del Subasio dall'Ing. Architetto Alfonso Brizi, Assisi 1898
- Bruscellini D., *Assisi città serafica e Santuari che la decorano ad istruzione e guida dei forestieri che vi concorrono*, Roma, Francesco Bourliè, 1821
- Cavonna N., *Assisi e dintorni*, edited by P. Michelangelo Bachecca, Assisi
- Della Porta P.M., *Guida di Assisi: Storia ed Arte*, Minerva, 1991
- De Vecchi Ranieri M., *La città nella Percezione di Pellegrini e viaggiatori*, in *Assisi in età barocca*, edited by A. Grohmann, Acc. Properz. Subasio, Assisi, 1992
- Hermann F., *Assisi, la ville de Saint Francois*, Traduction Francaise de Maxime Formout, Paris, Edittons Nilsson (Tour Imprimerie Arrault), 1927
- Falini P., *Il territorio storico di Assisi: una descrizione di sfondo per il nuovo PRG*, in *Rassegna di Architettura e Urbanistica*, nn.86-87, 1997
- Nicolini U., *La struttura urbana di Assisi*, Assisi, 1978, Tip. Porziuncola.
- Santucci F.(edited by), *Assisi*, Elio Sellino ed., Sant'Arcangelo 1997
- Lunghi E., *Immagini di Assisi nell'arte. Vedute della città di San Francesco nella pittura umbra dei secoli XIII-XVIII*, Editrice Minerva, Assisi, 1998
- 2011 Assisi Structural Plan
- 2011 Assisi UNESCO Management Plan
- 2011 Assisi Landscape Guidelines

Urbino

- *Urbino, ricerche preliminari alle varianti al PRG e agli strumenti attuativi*, IUAV, 1980, edited by Ruggero Faccin and Eleonora Mantese
- G.De Carlo, *Piano Regolatore di Urbino*, 1966 - 1994
- G. De Carlo, *Urbino, la storia di una città e il piano nella sua evoluzione urbanistica*,

- Marsilio Editori Padova, 1966
- Stefano G. Azzarà, *Politica, progetto, piano*, Cattedrale, Ancona, 2009
 - *Francesco di Giorgio architetto*, exhibition catalog, edited by F.P. Fiore, M. Tafuri, Milano 1993
 - F. P. Fiore, *Siena e Urbino*, in *Storia dell'architettura italiana. Il Quattrocento*, edited by F.P. Fiore, Milano 1998, pp.272-313
 - *Francesco di Giorgio alla corte di Federico da Montefeltro*, edited by F.P. Fiore, 2 voll., conference proceedings of studies, Firenze, 2001
 - B. Roeck, a. Tönnemann, *Federico da Montefeltro. Arte, stato e mestiere delle armi*, Einuadi, Torino 2009
 - *L'Università di Urbino e Giancarlo De Carlo: una città in forma di Campus*, in *L'Università e la città*, edited by A. Bona, in *Il ruolo di Padova e egli altri Atenei italiani nello sviluppo urbano*, conference proceedings of studies, Padova 4-6 dicembre 2003, Clueb Ed., pagg. 273-291
 - Franco Mazzini, *I mattoni e le pietre di Urbino*, 1982
 - Franco Negroni, *Appunti su alcuni palazzi e case di Urbino*, Urbino, 2005
 - Giancarlo de Carlo, Paolo Spada, *Relazione generale nuovo Piano di Urbino*, 1994
 - L. Benevolo, P. Boninsegna, *Urbino*, Laterza, Bari 2000
 - B. Secchi, *Urbino*, Casabella 613, 1994

Ferrara

- B. Zevi, *Saper vedere l'urbanistica. Ferrara di Biagio Rossetti, la prima città moderna europea*, Torino 1960
- T. Tuohy, *Herculean Ferrara. Ercole d'Este (1471-1505) and the invention of a ducal capital*, Cambridge University Press, 1996
- C.M. Rosenberg, *The Este Monuments and Urban Development in Renaissance Ferrara*, Cambridge University Press, 1997
- M. Folin, *Rinascimento estense. Politica, cultura, istituzioni di un antico Stato italiano*, Roma-Bari 2001
- *Este a Ferrara. Una corte del Rinascimento*, edited by J. Bentini, Cinisello Balsamo (Milano) 2004
- M. Folin, F. Ceccarelli in *Sistole/diastole. Episodi di trasformazione urbana nell'Italia delle città*, edited by M. Folin, Istituto Veneto di Scienze, Lettere ed Arti, Venezia 2006
- Associazione siti UNESCO, *Ferrara Città del Rinascimento e il suo Delta del Po*, UNESCO Management Plan, vol. 1, Ferrara, 2009
- *Ferrara*, in *Parametro* nr. 34, 1975
- Comune di Ferrara, *Proposta di variante al PRG*, 1974
- M. Bloch, *Apologia della storia o mestiere di storico*, Torino 1950
- C. Ginzburg, A. Prosperi, *Giochi di pazienza. Un seminario sul "Beneficio di Cristo"*, Torino 1975
- C. Ginzburg, *Miti, emblemi, spie. Morfologia e storia*, Torino 1986
- R. Bodei, *Se la storia ha un senso*, Bergamo 1997
- *Tante storie. Storici delle idee, delle istituzioni, dell'arte e dell'architettura*, edited by F. Cigni, V. Tomasi, Milano 2004
- *European Urban History. Prospect and Retrospect*, edited by R. Rodger, Leicester and

London, 1993

-

Internet sources

- www.unesco.org
- www.icomos.org
- www.comune.urbino.ps.it
- www.comune.assisi.pg.it
- www.comune.fe.it
- associazione@sitiunesco.it
- www.unesco.beniculturali.it
- <http://www.comune.assisi.pg.it/piano-regolatore-generale/>
- <http://www.comune.assisi.pg.it/piano-di-gestione-del-sito-unesco-di-assisi/>
- <http://www.comune.assisi.pg.it/piano-regolatore-generale/>
- <http://www.comune.perugia.it/canale.asp?id=5865>
- <http://www.comune.bettona.pg.it/>
- www.comune.bastia.pg.it/
- <http://www.ambiente.regione.marche.it/Territorio/Paesaggio/PPARPianoPaesistico>
- <http://www.provincia.pu.it/urbanistica/pianificazione-terre-via-beni-paesistico-ambientali/pianificazione-terre-ptc/piano-territoriale-di-coordinamento-vigente/>
- <http://urbanistica.comune.fe.it/index.phtml?id=67>
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source: G. De Carlo, *Urbino, la storia di una città e il piano nella sua evoluzione urbanistica*, Marsilio Editori Padova, 1966

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SIT Municipality of Urbino - <http://sit.cm-urbania.ps.it:8080/q4web/index.jsp>
Regione Marche
<http://www.ambiente.regione.marche.it/Territorio/Paesaggio/PPRPianopaesisticoregionale/Ambiti.aspx>
Urbino Municipal Archive

- pagg. 189-211
title: Visual integrity
source: photographs and elaboration by the author
processing tool: Adobe Photoshop

- pagg. 215-243
title: methodological approach - drawings, models and plans
source: elaboration by the author
processing tools: AUTOCAD 2010; 3D max 2010

- pag. 251
title: CDS/CCS
source: elaboration by the author
processing tool: AUTOCAD 2010

Ferrara

- pag. 261
title: Landscape resources
source: Structural Plan of Ferrara - Tutela Storico Culturale e Ambientale - tab. 6.1.1
rielaborated by the author

- pag. 264
title: Natural Landscapes
source: Municipality of Ferrara. Pianificazione del paesaggio: proposta per un atlante
Photographs by the author

- pag. 267
title: Ecological resources
source: Municipality of Ferrara. Pianificazione del paesaggio: proposta per un atlante
Photographs by the author

- pag. 269
title: Use of farming land
source: Municipality of Ferrara. Pianificazione del paesaggio: proposta per un atlante

- pag. 271
title: City systems
source: Municipality of Ferrara: PRG
rielaborated by the author

- pagg. 277-278
title: protection laws-city systems
source: Municipality of Ferrara: PRG
rielaborated by the author

- pagg. 279-280
title: Ferrara on the net-urban axes and centrality
source: drawings by the author
processing tool: AUTOCAD 2010

- pagg. 281-287
title: methodological approach - drawings, models and plans
source: elaboration by the author
processing tools: AUTOCAD 2010; 3D max 2010

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title: CDS/CCS
source: elaboration by the author
processing tool: AUTOCAD 2010

- pagg. 299-321
title: methodological approach
source: elaboration by the author
processing tools: AUTOCAD 2010; 3D max 2010

Conclusions

- pag. 328-330
title: Assisi-Urbino- Ferrara
source: drawings by the author

- pag. 339
title: Assisi-Urbino Ferrara
source: drawings by the author

- pag. 350
title: Aspects of Landscape, Cultural Landscape and HUL in Assisi, Urbino and Ferrara
source: drawings by the author

25. THE CONSERVATION OF HISTORIC URBAN LANDSCAPES: AN APPROACH

ABSTRACT

The European Landscape Convention promotes landscape conservation and planning, in the respect of people's cultures, both in an objective as well as subjective dimension.

A vital matter is also that of the role of landscape as "foundation of identity" (art.5), meant not only as the cultural asset of a nation, but also as a heritage shared by local communities.

The same Convention, in its Preamble, states that the safeguard should not be reserved only to the areas of outstanding beauty, but should be extended to *ordinary life landscapes* and even to degraded areas. The *whole territory* is a warehouse of resources to be managed and organized, and it has its own heritage of environmental *qualities* and settled *historic values*.

On an international level, the main references for the management of historic areas are to be found in the ICOMOS Charters and UNESCO Recommendations, and in particular in the 2011 UNESCO Recommendation on the Historic Urban Landscapes. It considers the historic city as a *living organism*, the result of a long stratification, which can adapt itself to the necessities of modern life, seen in a development perspective which should be based on the balance between *conservation and transformation*, the past and the future of historic urban landscape.

In this way, the thesis will illustrate a new inter & intra disciplinary tool for conservation, planning and management of Cultural landscapes with complex urban and historic characters.

Nowadays, in fact, the pressure on historic cities keeps on rising, making the conservation and management of historic urban landscapes one of the most dynamic tasks of our time. In this situation, traditional planning tools often seem inadequate or insufficient to adjust the transformations of historic cities: what could be a new possible approach for the conservation of historic urban landscapes?

Starting from a multidisciplinary study involving some historic cities (which includes the history of the city, cartography, urbanism, history of art, architecture, economy and

sociology), the research aims to give answer to the needs for modernization and investment in historic cities without compromising their historical character and identity, defining a new methodological approach (which is based on the study both of the significance of cities and of their "common resources") regulating the possibility of conservation/development of historic urban landscapes so that they do not lose the *qualities and the historical significance of the place* , in line with what is contained in the European Landscape Convention and, in particular, in the Draft Action Plan of the 2011 UNESCO Recommendation on HUL.

26. OHRANJANJE ZGODOVINSKO URBANIH KRAJIN: PRISTOP

IZVLEČEK

Evropska konvencija o krajini tako v objektivnem kot subjektivnem smislu spodbuja ohranjanje in načrtovanje krajine glede na ljudske kulture.

Pomembna je tudi vloga krajine kot "temelja identitete" (5. člen), ki pa ni mišljena le kot kulturno sredstvo naroda, temveč tudi kot dediščina lokalnih skupnosti.

Konvencija v svoji preambuli navaja, da zaščita ne sme biti namenjena le področjem, ki so izjemno lepa, temveč da jo je potrebno razširiti tudi na *navadne življenjske krajine* in celo na degradirana območja. *Celotno ozemlje* je skladišče virov, ki jih je potrebno upravljati in organizirati, ima pa tudi svojo dediščino *okoljskih lastnosti* in utečenih *zgodovinskih vrednot*.

Na mednarodni ravni pogloblitve reference za upravljanje zgodovinskih področij predstavljajo listine združenja ICOMOS in Priporočila UNESCO, zlasti Priporočilo UNESCO iz leta 2011, ki se nanaša na zgodovinsko urbane krajine. To Priporočilo obravnava zgodovinsko mesto kot *živ organizem*, rezultat dolgotrajne večplastnosti, ki se lahko prilagodi potrebam sodobnega življenja, v luči razvojne perspektive, ki naj temelji na ravnovesju med *ohranjanjem in preoblikovanjem*, preteklostjo in prihodnostjo zgodovinsko urbane krajine.

Na ta način bo disertacija predstavila novo med- in znotraj disciplinarno orodje za ohranjanje, načrtovanje in upravljanje kulturnih krajin s kompleksnimi urbanimi in zgodovinskimi lastnostmi.

Dandanes namreč pritisk na zgodovinska mesta kar naprej narašča, zaradi česar je ohranjanje in upravljanje zgodovinsko urbanih krajin ena najbolj dinamičnih nalog našega časa. V tem primeru se tradicionalna orodja za načrtovanje pogosto zdijo neprimerna oziroma nezadostna za ustrezno preoblikovanje zgodovinskih mest: kakšen bi lahko bil potencialen nov pristop za ohranitev zgodovinsko urbanih krajin?

Izhajajoč iz multidisciplinarne študije, ki vključuje nekaj zgodovinskih mest (kar zajema zgodovino mesta, kartografijo, urbanizem, zgodovino umetnosti, arhitekturo,

gospodarstvo in sociologijo), si raziskava prizadeva najti odgovor na potrebe po posodobitvi in naložbah v zgodovinska mesta, ne da bi ob tem ogrozila njihov zgodovinski značaj in identiteto. Hkrati skuša opredeliti nov metodološki pristop (ta temelji na raziskavi pomena mest, kot tudi njihovih "skupnih virov"), ki ureja možnost za ohranitev/razvoj zgodovinsko urbanih krajin tako, da le-te ne izgubijo lastnosti in zgodovinskega pomena kraja v skladu z vsebinami Evropske konvencije o krajini in predvsem Osnutka akcijskega načrta za Priporočilo UNESCA iz leta 2011 v zvezi z zgodovinsko urbanimi krajinami.