



POLITECNICO  
DI TORINO

# Honors thesis

---

COURSE OF  
TERRITORIAL, URBAN, ENVIRONMENTAL AND  
LANDSCAPE PLANNING

*Abstract*

**Visual assessment in Landscape Planning  
An Experimentation of 360° Photography**

*Tutor*

Claudia Cassatella

*by*

Lorenzo Attardo

February/March 2018

The definition of Landscape as “an area, as perceived by people” (CoE 2000) marked an important turning point in the studies of Landscape’s perception and its scenic values and highlighted the problem of their recognition no more considering only aesthetical and personal parameters, but considering them as a combination of knowledges that the entire population shares.

As Professor Cassatella writes in 2011, “the perceptual component is essential because it states the difference between the concept of Landscape and the apparently close concepts of territory and environment: the Landscape in order to exist needs a spectator that observes it, that perceives it.”

The first part of this thesis focuses on providing a research about the main practical fields that are found for the Spatial Governance’s visibility studies.

The practical fields are divided in:

- Management and protection of views;
- Visual impact assessments;
- Documentation through Landscape Atlases

Special attention is paid on the different modes of use of the analysis tools and their integration in management policies and territorial transformations.

The considerations that the research brought to light, lay the foundations for a territorial analysis through the 360° photographic technology.

Researches and evaluations on the Landscape’s scenic values are closely related to a “human scale”, as perceived from people. This factor implies the introduction of an observation scale very detailed and close to the object. Regional prescriptions can be illustrative because they declare which of the points of view are to be preserved and they set formally the visibility maps. Nevertheless, the Regional prescriptions need to be analyzed and expanded.

In this case, photography becomes an essential instrument if compared to the cartography from-above-perspective, that is very detached if compared to a “human point of view”. Photography can reveal sides of reality that are unintelligible to other instruments.

The “Guidelines for the analysis, preservation and valorization of the scenic-perspective sides of Piemonte’s Landscape” are a valid instrument to develop the management of such aspects, with particular attention on the local scale.

The use of a 360° photographic technology as an instrument to empower the Landscape’s Analysis allows an immediate and clear description and visualization of the Landscape’s scenic features if we consider the perception of the environment as the combination of different sensory spheres, both visual and auditory. This new instrument allows a multi-sensory exploration of the Landscape view points, and makes the user free to explore as one can change the visual angle, the axis and can interact with the scenic element of the Landscape.

To complete the thesis work, a practical field test was taken. The location chosen is in Avigliana (TO), in particular the two little lakes.

Moreover, to complete the trial, a computerized tool has been defined. By means of this online tool, the user can read the information concerning a point of view and also interact with the Landscape's scenic features.

### L'INTERFACCIA GRAFICA

L'interfaccia vuole essere semplice e intuitiva.

Tutte le informazioni possono essere aggiunte e rimosse a discrezione dell'osservatore.

Di default vengono visualizzate:

DESCRIZIONE DEL PANORAMA

LA LEGENDA DEI CARATTERI SCENICI

MOSTRARE LA LEGENDA

APRIRE LA SCHEDA DEI CARATTERI SCENICI

APRIRE LA SCHEDA DI VINCOLO

VISUALIZZARE LE VIEWSHED

RICHIAMARE LA DESCRIZIONE DEL PANORAMA

APRIRE LA MAPPA DEI CARATTERI SCENICI

APRIRE GOOGLE MAPS

PASSARE AL PANORAMA SUCCESSIVO O PRECEDENTE

CARTA DEI CARATTERI SCENICI CON INDICAZIONE DEL CONO OTTICO

MAPPA CON ORTOFOTO SATELLITARE (GOOGLE MAPS) CON INDICAZIONE DEL CONO OTTICO

SANTUARIO MADONNA DEI LAGHI

DESCRIZIONE DEL PANORAMA

LA LEGENDA DEI CARATTERI SCENICI

MOSTRARE LA LEGENDA

APRIRE LA SCHEDA DEI CARATTERI SCENICI

APRIRE LA SCHEDA DI VINCOLO

VISUALIZZARE LE VIEWSHED

RICHIAMARE LA DESCRIZIONE DEL PANORAMA

APRIRE LA MAPPA DEI CARATTERI SCENICI

APRIRE GOOGLE MAPS

PASSARE AL PANORAMA SUCCESSIVO O PRECEDENTE

CARTA DEI CARATTERI SCENICI CON INDICAZIONE DEL CONO OTTICO

MAPPA CON ORTOFOTO SATELLITARE (GOOGLE MAPS) CON INDICAZIONE DEL CONO OTTICO

The possibility to enhance a real ambience, not only by visible elements but also through a sound component and the possibility to visualize and interact with all the features of the Landscape is helpful and convenient also for unskilled people that get in touch with Landscape planning for the first time. Sometimes elements are too complex and elaborate, or simply not available in the proper scale, to be analyzed. That is the reason why the creation of virtual spaces allows us to enrich, study, build and deconstruct complex images of real life together with all the experiences that follow.

Link of the tool:

<https://s3-us-west-2.amazonaws.com/lorardo360/Avigliana/Desktop/Avigliana.html>

---

Per ulteriori informazioni:

Lorenzo Attardo, [attardolori@hotmail.it](mailto:attardolori@hotmail.it)