

## Tutela e Valorizzazione

*A modern systemic approach to combine history, knowledge, technique and market needs for a modern vision of Cultural Heritage. The case study of the Royal Palace and Park of Caserta UNESCO site.*



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**speaker: mario gentili**



## The problem

Cultural heritage is inevitably subject to the  
decrease caused by time, catastrophes and human  
interventions.

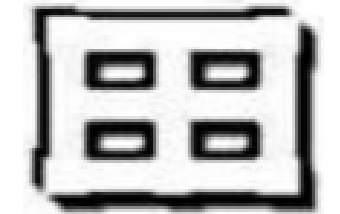
Its documentation, best possible  
conservation and monitoring is one of  
**our most important duties**





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## The approach

## SYSTEMIC

within the paradigm of the Complexity theory



The knowledge, in contemporary society , is a process every day more integrated and independent from logistics and from the time constraints.

The use of digital and virtual technologies, social networks, simulations and elements, originally born in computer game, have found an application in the life of all the days.

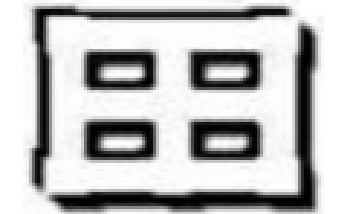
Methodologies and tools evolve, more or less fast, in the direction of more and more hybrid and multimodal systems, which require the use of different technologies combined to reach an audience of users characterized by a hybrid digital - culture.

The same virtual communities are changing in cultural belonging function of the participants, a culture characterized by different contact elements: interests, experiences , etc., and where digital is just one of many aspects of the context.



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At the same time, a modern vision of Cultural Heritage cannot ignore the new market needs: *find the necessary financial resources to invest in ambitious projects of cataloging and dissemination of culture.*

### HOW?



- Tools, APPS, digital technicalities but also a quality product/services able to recall and involve a large number of users;
- Create new networks of users based i.e. on interest, age, social culture;
- Attract and retain sponsors and public or private stakeholders.

speaker: mario gentili

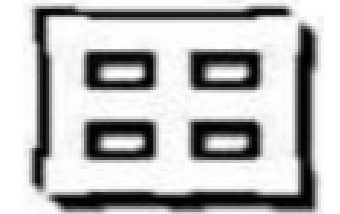


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Museo Virtuale



## The approach

### SYSTEMIC

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Last, but not the least, the modern Cultural Heritage must break down the "architectural" barriers of culture and to allow everyone, even virtually, enjoy the artistic heritage.

The augmented reality, can enhance the five senses and replace the missing ones ( sight, hearing , ... )





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L'inventore dell'approccio sistemico



Il tutto è più della somma delle singole parti

## The approach

## SYSTEMIC

within the paradigm of the Complexity theory

- Geomatics measurement,
- remote sensing interpretation,
- innovative data processing elaboration,
- historical research,
- historical cartographic,
- iconographic studies of representation,
- photographic documents,
- 3D virtual reality environment



## AND

- qr coding,
- mobile apps.



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## The result

### Unesco site

### Royal Palace, Park and aqueduct of Caserta

The CSI job results is based on the integration of numerous surveying methodologies among them:

- photogrammetry, by Structure From Motion,
- GNSS and SAR for digital representation of terrain (DSM, DTM e DEM), by about 36,400 GNSS points and 150 Ground control points,
- georeference,
- data processing under GIS environment,
- point cloud editing,
- historical research,
- 3d modelling by computer game environment,

featuring all virtual navigation capabilities.

An ulterior aim of this work is to divulgate, by the augmented reality, both the knowledge connected to this wonderful site and the site itself.

In addition , the CSI approach is proposed as a reference point to discuss how technology and new media can be used to promote the development and cultural heritage.





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### A CROSS-DISCIPLINARY IMPLEMENTATION: FROM ARCHIVAL, ICONOGRAPHICAL AND BIBLIOGRAPHICAL RESEARCHES TO 3D MODELLING

A HISTORICAL INVESTIGATION AS AN APPROACH TO A BETTER UNDERSTANDING OF MONUMENT (substantial archival and historical research)



selection of credible, reliable and useful data

RESULTS



semantization and new reading of monument

historical stratification

information about materials, style, attribution and period

reconstruction of narrative identity

improvement of museum communication



NEW AUDIENCE



VIRTUAL MUSEUM AND VIRTUAL CATALOGUE

One of the aims of this study is to build a 3D systematic method to cataloging for documentation of an architectural and sculptural artifacts.



functional digital database for further historical researches

#### CREATIVE ENGAGEMENT

Virtual Museum can change the way audiences engage with collection.

Historical investigation





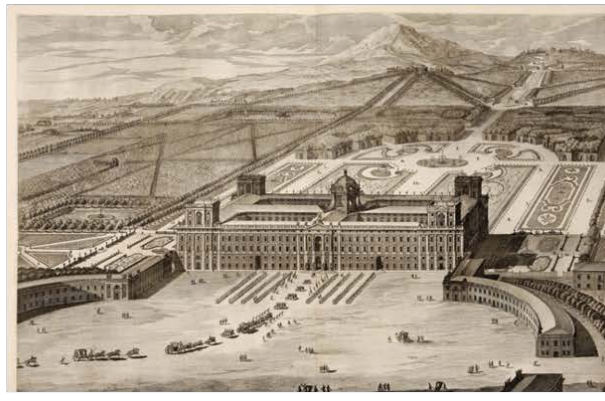
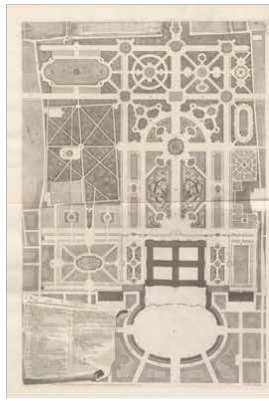
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**HISTORIAL RESEARCH** - Architectural and ornament drawings by Luigi Vanvitelli.

Historical investigation





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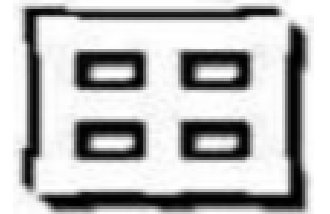
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### ICONOGRAPHICAL ANALYSIS – CESARE RIPA

Comparative analysis between the statues of the Royal Park of Caserta and the "Iconology" by Cesare Ripa. Many sculptures in the park was still without any identification (or with mis-identification). The Iconology of Cesare Ripa, published for the first time in 1593, was the most complete repertoire of allegorical images that become the reference point for artists from different periods and countries.

Historical investigation



speaker: mario gentili



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Historical investigation

### FONTANA DI CERERE

POSIZIONE

**CERERE:**  
Nella mitologia greca era la dea dell'agricoltura, con particolare riferimento al grano; a volte era venerata come madre terra, la fonte primaria della fertilità, ma anche dea della nascita, poiché tutti i fiori, la frutta e gli esseri viventi erano ritenuti suoi doni.

La Trinacria simbolo della Sicilia

**AUTORE:**  
GAETANO SALOMONE

**DATAZIONE:**  
1783-1784

**DESCRIZIONE:**  
La fontana in oggetto è decorata da un gruppo di sculture, che segue una **schema compositivo piramidale**. La scultura all'apice della composizione rappresenta una figura femminile, dalla quale la fontana trae nome, ossia **Cerere**. Essa sorregge un **medaglione**, in cui vi è l'impronta rappresentante la **Trinacria**, il simbolo della Sicilia. La Trinacria è una rappresentazione di una testa femminile (testa di Gorgone) collegata direttamente a tre gambe piegate. La tradizione classica interpreta questa immagine come riferimento alla forma triangolare dell'isola o ai tre promontori della Sicilia, cioè Capo Peloro (a nord-est), Capo Boëo (a ovest) e Capo Passero (a sud-est). La figura di Cerere, raffigurata seduta su un seggio roccioso, è circondata da **due putti**, di cui uno, in piedi, la aiuta a sostenere la medaglia. L'altro, seduto alla sua destra, sembra indicare la medaglia. Tra il seggio di Cerere e i putti trovano posto due animali, riconosciuti da alcuni studiosi come **cerbiatti**. Il gruppo centrale della fontana si trova su un basamento a forma di timpano ornato sul davanti da una **maschera grottesca** dalla cui bocca fuoriesce acqua. Il basamento è fiancheggiato da quattro figure femminili variamente atteggiate (**ninfe**).  
Da un documento trovato nell'archivio della Reggia di Caserta risulta che il capo della dea era un tempo ornato da una **ghirlanda di spighe di grano bronzeo**, e così per le ninfe che la circondano con i loro fasci, ma che nel 1799, in seguito all'occupazione francese, ne furono private.

Il secondo piano della composizione viene completato da due figure maschili semisdraiate, di età differenti, riconosciute come **personificazioni di fiumi** che attraversano la Sicilia. Gli studiosi hanno avanzato diverse ipotesi identificative. Secondo alcuni studiosi trattasi del **Simeto** e di un altro fiume, riconosciuto come: l'**Anapo** (secondo il Cherici), l'**Orieto** (secondo il De Filippis); l'**Aretusa** (secondo il Bartolini). Secondo il Patturelli trattasi invece dell' **Anapo** e dell'**Aretusa**. La **Fonte di Arteusa** è una famosa fontana di Siracusa, intorno alla quale sorse il mito che considerava la sorgente come effetto delle metamorfosi subita dalla ninfa di Diana, dallo stesso nome, perché sfuggisse agli amori di Alfeo, poi mutato in fiume.

Più in basso, in primo piano sono collocate **due coppie di tritoni** suonanti una specie di conchiglia (la **buccina**), e da cui fuoriesce l'acqua e **due mostri marini** con bocche zampillanti. Il tutto è completato dalle decorazioni architettoniche del basamento rettangolare della fontana.

Questa fontana era anche chiamata **la zampilliera** e il Patturelli ci dice il perché: "... agli estremi del marciapiede dell'ultima vasca vi è il grazioso gioco d'acqua che girando una chiave all'improvviso si vede uscire da piccoli zampilli talmente intrecciati tra loro che sta a riguardar la scultura trovasi tutto circondato d'acqua senza sapere come".

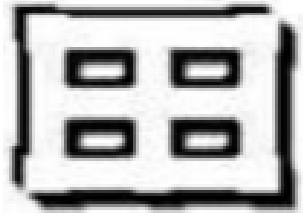


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**The result**

**Unesco site**

**Royal Palace, Park and aqueduct of Caserta**

Royal Palace Park



Castelluccia



Bridges of Valley (Vanvitelli)



***Thank you for the attention***