6th International Congress on
“Science and Technology for the Safeguard of Cultural Heritage in the Mediterranean Basin”

PROCEEDINGS

VOL. I – Sessions A, C
Resources of the territory
Biological diversity

Athens, Greece
22 – 25 October 2013
Publishing coordination, revision and realization: Angelo Ferrari - CNR, Inst. of Chemical Methodologies, Italy;

Digital Editing and Data Processing: Stefano Tardiola and Gianni Pingue- CNR, Inst. of Chemical Methodologies, Italy;

Secretariat: Enza Sirugo - CNR, Inst. of Chemical Methodologies, Italy; Manuela Manfredi, A.I.C. Secretariat, Italy.
URBAN MORPHOLOGY AND ARCHITECTURAL DESIGN IN MEDIEVAL SMALL TOWNS: SAN VITO ROMANO

Camiz Alessandro

1 “Sapienza”, Università di Roma, Dipartimento di Architettura e Progetto, Laboratorio di lettura e progetto dell’architettura, Rome, Italy, alessandro.camiz@uniroma1.it

Keywords: Urban-morphology, Architecture, Urban-design, Toponyms, Small towns, Urban tissues

Abstract
The morphological study of medieval urban fabric experiments new methods to process all available information. Within the debate between continuity and discontinuity of classical rural settlements and the medieval castles, some small towns in different regions of Europe show analogies and close continuity between the roman villae rusticae system and the fortified hill-top towns through a hill-edge phase prior to the fortification. The knowledge of the diachronic series of documents on the ownership of single lots is a prerequisite for further testing an established method of analysis, proposed here to reconstruct the growth phases of a small town. Overlapping data from the morphological analysis, the distribution of praedial toponyms, the series of imperial diplomas, the quantitative analysis of notarial medieval sources, the series of maps, views, and cadastres, and the mosaic of current cadastral ground plans, it is possible to outline the history of a settlement, in cases where the historical documentation alone is not sufficient to provide an exhaustive picture. The material consistence of the urban settlement, considered as a unique and unrepeatable historical document, can provide guidance on the knowledge of building types, urban fabric and on the hierarchy of paths. Considering therefore the city as an organic whole and overlapping data on monumental buildings, such as forts, castles, churches and palaces, with the urban and rural residential tissues, it is possible to focus on an intermediate development phase of urban fabric in V-X cent. The knowledge of the processual evolution of the urban centre is the premise for its contemporary development, so that the new design is the last phase of an ongoing continuous evolution of the urban tissue.

Entre les temps différents de l'histoire, la longue durée se présente ainsi comme un personnage encombrant, compliqué, souvent inédit. [1]

THEORETICAL PREMISE: MEMORY, DEFENCE AND CONNECTION
Considering an historical town as a living organism belonging to a larger scale territorial organism, makes central the theme of memory: some memories are remote and completely forgotten today. The historical work on medieval landscapes consists mainly in the reconstruction of a lost memory, so the exhaustive historical documentation is necessary for the safeguard and for the correct future development. Understanding the origins of a town is the prerequisite for a sustainable contemporary urban design. Most medieval small towns in central Italy share some typical characteristics: the urban settlement starts on the nodal development, polarized by a market, of the intersection between a ridge and an anti-ridge path. The defence from enemies and the connection with allies were the foundation characters of most of these settlements; analogously today, the defence from urban sprawl and the connection...
with infrastructures can be included in contemporary guidelines for urban design. The analysis, according to an established methodology [2] [3] of small historical centers and their landscape allows us to consider the knowledge of the formation process of an urban centre before any future urban transformation. The so-called "small" historical centers of the province of Rome are an important cultural resource and constitute, with their tangible and intangible Cultural Heritage, a unique social capital that we need to enhance, protect and, above all, document within their historical landscape [4] before that the urban development will obliterate their historical memory.

The case of San Vito Romano, analyzed according to the “close relationship between the ancient documentation and the physical shape of the settlements” [5] is characterized by separate development phases which are clearly readable. The work presented here is part of a research on the territory between Tivoli, Subiaco and Palestrina [6]: an area characterized by different ethnic criminals, the Equus, the Ernicus and the Latial criminal. One case study is focused in particular, that of San Vito Romano, considered as an organic part of the same ridge, the watershed between the drainage basins of the rivers Sacco and Aniene, marking the border of different cultural areas since archaic times [7].

HISTORICAL SETTING: ROMAN VILLAS, SMALL TOWNS AND CASTLES

In the area of the Aniene valley the main centers of population underwent a military restructuration between the tenth and eleventh centuries, for some authors as a defense strategy following Hungarians’ and Saracens’ incursions in the IX cent., for others as a consequence of the decline of the allodium. Toubert, in his foundational work on the castles of Latium [8], dated in first approximation the construction of a fortification in the territory of San Vito between 1050 and 1075, using a documentation that, although comprehensive for the historical picture at the regional scale, was not exhaustive to determine the year of the Incastellamento for San Vito. In fact the Latin term castrum (castle) does not appear in archival sources before 1250. The settlement of San Vito has some special features: there are two distinct hills, one hosts the church of S. Vito and on the other stands the Colonna castle, now Theodoli. In addition to these urban systems, a linear baroque addition, dated 1649, connects the two hills. Another peculiarity of this town is the presence of four churches (S. Vito, S. Biagio, S. Maria de Arce and SS. Sebastiano and Rocco) [9] quite atypical for small a settlement. In nearby towns of similar size there is often only one urban church. From these initial
considerations, we can recognize a composite urban settlement, grown in separate and recognizable phases. There has been a long historiographical *querelle* on continuity or discontinuity of rural settlements in the early Middle Ages (V-X cent.). What happened after the decline of the rural spread classical settlement system, before small towns arose in the tenth century along the ridges and on promontories, during what historians have called the “Incastellamento”? The question can be summarized as follows: after the sixth century in many parts of Italy scattered rural settlements disappear and, only in the tenth century, the castles appear, in place of the dispersed rural roman settlement system. According to the *continuist* thesis the urban centers supplant the ancient and late antique settlement, inheriting scattered characteristics, so they occur with some continuity with the *villae rusticae* [10]. However, archaeological data show no persistence in these villas after VI cent., so the proponents of the *discontinuist* thesis, from the examination of excavated rustic villas, state that most sites show no continuity of use after the sixth century. After the Gothic war the population abandoned the villas and shifted in villages mainly built of wood, until the tenth century when the first fortifications, or churches, were built in stone, in a hill-top position and consequently the population settled around these new territorial poles. From archaeological data there is no persistence of use beyond the sixth century, therefore there can be no continuity between villas and castles [11]. We instead hypothesize that the *Incastellamento* happened to control existing demic centres [12], founded since the longobard dominion (VI-VIII) and that these mostly derived form the ribasification of classical *fundii* o late antique *massae* [13]. Therefore, the *Incastellamento* phenomena should be reinterpreted under the light of the dialectics between the old *allodium* and new feudal structure hence the Ottonian *renovatio imperii* (IX-X sec.) [14]. Some small towns in different regions of Europe show analogies and close continuity between the roman *villae rusticae* system and the fortified *hill-top* towns through a *hill-edge* phase prior to the fortification [15].

It is evident, however, that most of the rustic villas investigated by archaeologists are abandoned settlements today, devoid of continuity of use in their own nature. The eventuality that some of these villas were transformed into urban centers still existing today, was not considered at all. Our hypothesis, based on new methodologies for the study of medieval landscape [16], is that the *Incastellamento* was accomplished to control established demic centers that were in strong continuity with the rural classical and late antique settlements, especially where the short Longobard domination had led to new territorial polarities. So these early urban centers, not *hill-top*, but mostly *hill-edge*, were born by the ribasification of rustic villas and their territories, often described in medieval documents as *fundii* or *massae*. The *Incastellamento* phenomenon should be reinterpreted in the light of the dialectic between the old allodiality and the new feudalism, following the comital and episcopal control starting in Carolingian age, meant to re-establish the imperial military, economic and political control of the territory.

**TOPONYMY: IMMATERIAL CULTURAL HERITAGE**

Praedial toponyms take form adding an ownership suffix to the first property owners’ name: *i.e.* -anus (Latin), -axum, -ascum (Ligurian), -ago, -aco, -igo (Celtic). Latin Praedial toponyms in particular are formed by the *gentilicus* or by the *nomen* of the first owner of the land, followed by the suffixes -ano, -ana, -ani, -anello. The Latin praedial toponym ending with -anus can be subdivided following the different forms of land ownership: gentile, patrician ownership...
(over 500,000 Sq m), or plebeian private property, starting from two iugera (5,000 Sq m). Praedial toponyms are an immaterial evidence of the roman colonization of the territory [17], survived across the middle ages for notarial continuity. After serving in the army every Roman veteran received a praedium from the state as a reward for his services. This was an estate recorded on a bronze plate (forma), showing the boundaries of the lot, the neighbours, the location, any geographic stronghold (termini) and the name of the assignee. Sometimes the ancient properties of a gens, existing before the Gracchan reform, were included in the formae and constituted large estates called lati-fundi. Any property was recorded in duplicate copy on bronze and filed at the belonging municipium and in Rome. These bronze formae were preserved to solve the frequent disputes that arose between the owners, neighbours, colonists and the res publica. After the Civil war (44-31 b.C.) the Ager praenestinus was divided in two parts by Octavian after clashing here with Tiberius, and assigned “in iugeribus” as a military colony to the veterans of the war. The area farthest from Praeneste, referred in the Liber Coloniarum as “circa montes”, including the territory of San Vito, remained to the ancient owners [18].

Praeneste, oppidum. ager eius a quinque viris pro parte in iugeribus est adsignatus [ubi] cultura [est]: ceterum in absoluto est relictum circa montes. iter populo non debitur [19]

The analysis of the positions of preaedial toponyms in the area around San Vito Romano showed that some of these ancient names survived through the centuries for notarial continuity. [20]. Medieval documents, citing the tablets naming the fundi, have preserved the praedial names, listing them on the registers, on cadasters and finally on modern maps. The analysis of the distribution of praedial place names over an area large enough, allowed to analyze their characters [21]: the prevalence of a slope facing south or south-east, the proximity to the spring line (500-600 m above sea-level), the alignment along the ancient road network. These characteristics are very similar to those of the settlement system of the roman rustic villas, as can be verified comparing them with the distribution of villae around Ruffi e Prenestini mountains [22]. The station of Treblis is shown in the Peutingerian tabula along the via praenestina after Praeneste, and has been identified by some as Trevi. The distance of fifteen miles indicated between Praeneste and Treblis does not correspond to the actual twenty-nine miles and, according to a consolidated interpretation [23], should instead be compared with the distance of fifteen miles from Trebula Suffenas. This Roman municipium was placed at the end of the valley of the Empiglione river close to the town of Ciciliano [24]. Therefore, a branch of a Roman road ran through the territory of San Vito, a diverticulum named Empolitana connected the via Valeria, from Tibur to Trebula Suffenas, and then reached the via Praenestina.

In the brogliardo of the Gregorian cadastre there is a small urban district in the medieval part of San Vito called “sotto l’Obigo” (fig. 2), a morphotoponym interpreted as deriving from the Latin “ob iugum”, meaning “near the top”, as the site is close to the hill-top where the castle was built. The convergence of the urban road network in that point, and not in the site of the castle, demonstrates the highly polar characteristic of this site, where some built structure was acting as an attractor since ancient times. After the reconstruction of the actual cadastral mosaic, with the collation of planimetric attachments, it was possible to outline a terraced court structure measuring about 17.70 x 35.50 m (i.e. LX x CXX Roman

1 Liber Coloniarum, I, 14-17.
feet) that are comparable to the measures of a Roman villa. The presence of a water-spring in the same part of the town and, above all, the discovery of two marble heads of the second century during the restoration of the Ciocia fountain conducted by the Archaeological Superintendence for Lazio, made believable the hypothesis that the settlement started from the ruins of a villa rustica, or of another terraced structure. Then, starting from the tenth century as evidenced by documentary framework, first a church and then a castle have settled in the same place to control a population already present.

This territory after the gothic war was occupied by the Longobards and, from 568 to the promissio carisiaca (754), was under their direct influence. Therefore, the phase of Incastellamento follows two centuries of Longobard territorial hegemony. This was characterized mostly by the expropriation, following the rule of hospitalitas, of Roman patrician properties, reassembling the fundi of a fallen empire into territorial entities of greater extent, the massae, where a duke or a gastald administered the Latin workers who were predominantly in a servile condition [25]. Retracing the news taken from imperial diplomas and papal bulls [26]: the first written note dates back to 967, when the diploma of emperor Otto I confirmed the properties to the monastery of Subiaco, and mention was made of a «portione Costantie bone femine in Sancta Savina et in Sancto Vito» 4. These territories had been donated to the abbey of Subiaco a few years earlier, as described in a document of February 20th 964, whose excerpt reads «Adrianus nobilis vir, et Constantia nobilissima femina, jugales, concedunt Georgio Abbati quasdam terras» 5. In subsequent years, in the absence of a castle, we find a “casale” in the document where Pope John XVIII confirmed the properties of the monastery of Subiaco in July 21st 1005: «casale in quo est ecclesia viti» 6, repeated in the privilege of Benedict VIII in 1015 with the addition of the word sancti, «casale in quo est ecclesia sancti viti» 7 and again in that of Leo IX on October 1st 1051. We find a mention of the territory in July 1085, when Trasmundo, son of Amato of Paliano, gave to the monastery of Subiaco his possessions, «et ea que

Fig. 2 Urban toponyms from the Brogliardo of the Catasto Gregoriano (1819), M. Dorata, 2011.

3 Ibid., V, 769.
5 Ibid., XV, 40.
During the twelfth century there is an indication of a rural commune in the transfer of the lords of San Vito of certain rights on lands to the Abbot Simon, «nos domini de sancto vito, videlicet, Miro, Benzo, Attinulfus, Crescentius»⁹. It is a plural government dealing directly with the abbey, quite different from that of a feud, and it is difficult to recognize the presence of a castle. The notice that in 1180 San Vito become part of the feud of the Colonna of Genazzano, along with Ciciliano and Pisoniano[27], was challenged [28] and the annexation of this territory to the Colonna feud has been dated between 1261 and 1276 [29]. We think it is, however, reasonable to assume the construction of a castle since 1167, year of the destruction of the fortress of Castellone and of the displacement of the population therein established at San Vito. But the first certain notice of the existence of a castle is in 1250 when, within a question on the borders of the tenimentum podii (now Poli), is mentioned for the first time the «tenimentum castri sancti viti»¹⁰. The presence of a fortification is confirmed by subsequent documents. In 1252 the act of renunciation of Peter of Oddone Colonna cites «in castris Sancti Viti, Montis Manni, Castri Novi, et Pisciani, et ipsorum territoriis»¹¹. The construction of a castle therefore takes place between the end of the twelfth century and the first half of the XIII (1167-1250), almost three centuries after the presence of a population and an urban settlement that is obviously pre-existing the Incastellamento. As a comparison element with the urban settlements, the monastic structures of this area seem to follow the same dynamics, starting in continuity with rustic roman structures, and then moving in hilltop position after the X cent. [24].

RESULTS: THE MOSAIC OF CADAstral PLANs FOR URBAN DESIGN

The knowledge of the processual evolution of the urban centre is the premise for its contemporary development, where the new design is the last phase of an ongoing continuous evolution. This experimental design finds its compositional rules from the knowledge of the formation process of the settlement: the position and shape of these small towns, bourn genetically for defense, led to the isolation by large distances from the modern transportation system. It these small municipalities the attraction exerted by the neighboring metropolitan area of Rome determines a strong reduction in labor supply, with a consequent population shift towards the Capital and a substantial and gradual depopulation. Many of these centers, in their eldest parts, bear large urban tissues not suitable for vehicles and therefore practically unaccusable, with considerable difficulty for the contemporary development.

Today this settlement system is entering a deep crisis and the proposed project intends to take on a transformation which, starting from the knowledge of the formation process is still in progress, and proposes consistent changes that tend to solve the identified problems. In San Vito Romano, the project deals with the area between the “Cavone”, a steep ditch where the blocks of sandstone used to build the city were extracted, and the via degli orti. The project area is located on the edge of the town, on the less steep side where it was necessary to dig a ditch for the defense from the outside and where the terraced houses take the form of a wall, incorporating several defensive towers. This remnant of the defensive
system of the medieval city had become an open dump, although in the 80s a reinforced concrete staircase was built, connecting the upper part of the city with the new outer ring road. The working hypothesis is that of an integrated plan for the southern side of the historical center to re-polarize it with a small parking lot in the lower part of the city where the new road is, redefining the vertical connection between this new road and the ancient city, now isolated by an altitude of more than 50 m. The project involves the pedestrianization of the historical center and the movement of vehicular mileage, except for emergency vehicles, in the outer ring. (fig. 3, 6, 7).

**Fig. 3** Photo rendering, *Reading and designing San Vito Romano*, Graduation thesis, rapp. G. Strappa, co-rapp. A. Camiz, candidate P. Ciotoli, Faculty of Architecture, Sapienza University of Rome, 2012/2013.

**Fig. 4** ASR, Catasto Gregoriano, Comarca, 182, San Vito, Mappa, (1819), detail.

**CONCLUSIONS: CONTINUING URBAN TISSUES TO PRESERVE THE HERITAGE**

Understanding the origins is the premise for the contemporary design, conceived as the continuation of an ongoing process. Considering the urban tissue as a living organism [30] can resolve the contradiction between preservation and development. The project involves the reversal of the urban tissue along the matrix path of the baroque linear addition, close to the *via degli orti*, and the continuation of a orthogonal path to form a specialized building that follows the formation process typical of the Roman palace [31], recognizing the matrix path of *via degli orti* and incorporating the three cells of the marchional stables in the
new project and continuing the existing path of *via degli orti* [32]. The building hosts a square on its roof around the marchional stables that, as part of the new proposal, should be restored and opened to public use. The *via degli orti*, at a level of 5 m below the main street, is connected with the nodal space of an open courtyard facing the valley, and at the lower level by a theater. The building is also the arriving point of an underground mechanized lift in adherence with the walls of the *Cavone* and that connects the ancient and the modern road system.

![Mosaic of the cadastral plans of San Vito Romano showing in red the four churches.](image)

**Fig. 5** Mosaic of the cadastral plans of San Vito Romano showing in red the four churches, A. Camiz, P. Carlotti, P. Ciotoli, M. Longo, 2012.

![The formation process of the proposal.](image)

**Fig. 6** The formation process of the proposal, *Reading and designing San Vito Romano*, Graduation thesis, rapp. G. Strappa, co-rapp. A. Camiz, candidate P. Ciotoli, Faculty of Architecture, Sapienza University of Rome, 2012/2013.

The building material used for the project is the local sandstone installed within metal gabions, in order to continue the existing city with the same material, forming the base of the overlying figure of the castle. As if the castle was the main subject of the urban composition, and the contemporary intervention is merely a silent frame of the existing heritage [33]. This experimental design considers the evolving territorial cycles and tends to counteract the contemporary tendency of building mostly in the valleys. The project locates itself on the edge of the urban tissue, finding in the inherited characters the compositive rules for a contemporary design, free of any mimicry or historicist attitude, continuing instead the formation process and making it compatible with the identified contemporary needs. It is not possible anymore to preserve historical centres without admitting their development 12, it is necessary to find an equilibrium between development and safeguarding. Finding in the historical context the rules for its continuation is the better way to keep alive and growing urban structures that are at risk.

---

ACKNOWLEDGEMENTS

This work synthesizes the studies carried out during a PRIN research\textsuperscript{13} dedicated to small towns in Latium and in particular pertaining the landscape and the urban centres of San Vito Romano, Pisoniano and Bellegra in the province of Rome. Part of the design experimentation has been carried out within an international workshop\textsuperscript{14} and during the research connected to graduation thesis in architecture\textsuperscript{15}.

\textsuperscript{13} PRIN, Research Project of Relevant National Interest 2009, \textit{From urbanized countryside to “expanding city”: the norms of composition for the architecture of the territory of minor centres}, scientific coordinator L. Ramazzotti (University of Rome, Torvergata), research unit, \textit{Intervention methods for development and design in urban tissues of small towns of Lazio}, (“Sapienza”, University of Rome) responsible, G. Strappa, Laboratorio lettura e progetto dell'architettura, LPA-DIAP.

\textsuperscript{14} International workshop: \textit{Architecture of urban tissues. Designing for small historical towns}, San Vito Romano (RM) June 9th-13th 2012, Bauhaus-Universität Weimar, University of Miami,
REFERENCES

Politecnico di Bari, Université de Liège, Università degli studi di Parma, Sapienza Università di Roma, Università degli Studi di Roma.