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Tracing Late Roman Rural Occupation in Adriatic Central Italy

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Abstract

This paper examines the identification of rural occupation and the changing settlement pattern during late antiquity in the central part of Adriatic Italy. Archaeological field survey has proven to be the most efficient tool to map ancient settlement patterns on a regional scale. Although the methodological approach to map and classify Roman rural settlements has undergone many advances over the years, the identification of Late Roman occupation and the evaluation of the data remain problematic. Recent survey work in the Potenza Valley (Picenum) provides an excellent case study, demonstrating the problems and pitfalls connected with the identification of Late Roman rural settlements. To optimize site detection, the Potenza Valley Survey project invested in the exhaustive analysis of diagnostic finds from stratified contexts of the Roman colony Potentia. Following the study of the surface scatters, the settlements were classified according to a site typology, creating a third dimension in the detected occupation pattern. Broader historical questions could be addressed by integrating the survey results into a wider framework, making use of information from excavated sites and written documents. This approach allowed us to sketch the particularities of the central Adriatic countryside during late antiquity, demonstrating the relevance of regional diversity within this period of transformation.*

THE POTENZA VALLEY SURVEY PROJECT

Introduction

During the past two decades, researchers have shown increasing interest in late antiquity. Data from archaeological research have contributed more and more to the reconstruction of Late Roman society and the transition to the Early Middle Ages. Excavations within former Roman urban centers, regional survey projects, and the analysis of Late Roman pottery have shed new light on the Late Roman towns, rural settlements, and exchange patterns. The growing research effort concerning late antiquity throughout the Mediterranean has highlighted the significance of regional diversity. The type of landscape, the nature of the local economy, the complex chain of political events, and the impact of war at-large determined the regional development of towns and rural settlements. Archaeological survey is well suited to the investigation of settlement patterns on a regional level. The Potenza Valley Survey project gives us the opportunity to study Late Roman site dispersion within Adriatic central Italy. Even now, little is known regarding the evolution of settlements from Roman times into the Middle Ages in this region. By presenting the approach and results of the project, we hope to start a discussion on the particularities of Late Roman rural occupation in this area.

Approach

The project, "The Potenza Valley Survey (PVS): From Acculturation to Social Complexity in Antiquity: A Regional Geo-Archaeological and Historical Approach," began in 2000. The central objective of the first phase of the project, finalized in 2006, was to map all occupation from prehistory up to the Middle Ages within the research area. Although the PVS is a multiperiod project, two primary focal periods were investigated: (1) the settlement patterns of the Iron Age Piceni culture and the global impact of Roman colonization and (2) late antiquity in the area. The second focus arose from the participation, beginning in 2002, of the Ghent University team and its interuniversity program, "Urban and Rural Transformation in the Western and Eastern Roman Empire: Interdisciplinary Archaeology of Late Antique and Early Medieval Times." This interuniversity project studied several aspects of Late Roman and Early Medieval society, such as the transformation of the urban and

rural landscape, the economy, and ecological changes within four geographical areas of the Roman empire, namely Sagalassos, in Turkey (Katholieke Universiteit Leuven), Boeotia, in Greece (Leiden University), the Scheldt Valley, in Belgium (Université Catholique de Louvain), and the Potenza Valley, Italy (Ghent University).

A GIS-based multidisciplinary approach was applied, using remote sensing applications (active oblique aerial photography throughout the valley and on-site geophysical research)[1] and traditional artifact survey in combination with a systematic geomorphological study of the research area.[2] As one of the main objectives of the project was to map long-term settlement patterns, a basic linewalking survey technique was chosen, along with on-site random walking. Within the sample areas, each field was considered to be one collection unit, defined by modern field boundaries and topographic breaks. The preference was given to plowed fields—whether or not containing vines or olive trees—for optimal visibility. All the field data were noted on forms with set criteria for all visibility factors (e.g., weather, field conditions, soil type, vegetation), specifics on the applied methodology (e.g., number of surveyors, distance between surveyors, line- or random walking), and locational information (e.g., cadastral maps, GPS waypoints). The surveyors were positioned at 5 m to 15 m intervals, depending on the visibility conditions, walking in the direction of the plow furrow. The off-site density of the field was recorded as high, medium, or low, based on the number of artifacts visible on a straight line of about 50 m (respectively >15, >5, and ≤5 artifacts per meter). When different nuclei of finds were located within a larger artifact scatter, the material was collected separately. This proved to be crucial for interpreting site occupation history, enabling us to distinguish different nuclei of, for example, protohistoric and Roman pottery.

General Setting

The central part of Adriatic Italy is characterized by a series of river valleys, which are oriented east–west and which cross the landscape from the Apennine Mountains to the Adriatic Sea. The valley of the Potenza River offers interesting research perspectives. The upper Potenza Valley was from prehistory onward an important Apennine corridor between Tyrrhenian and Adriatic Italy. During Roman times, the Flaminia ab Urbe per

Picenum Anconam, a diverticulum of the Via Flaminia, connected Rome directly with Ancona, the most important central Adriatic port in Roman times (fig. 1). This road, also known as the Flaminia Prolaquense, passed Nuceria (Nocera Umbra), the road station Dubios,[3] Prolaqueum (Pioraco), and Septempeda (San Severino Marche), deviating north toward Trea (Treia), passing Auximum (Osimo) to reach Ancona.[4]

The Roman *municipia* Septempeda, Ricina, and Trea in the middle valley, and the colony Potentia in the lower valley, are only minimally covered by modern occupation, allowing intensive intra-site artifact surveys and the use of remote-sensing applications. Three large sample zones were systematically spaced at regular intervals across the approximately 80 km long Potenza Valley, between the mountains and the sea. The selected areas cover the main landscape types of the region, generally coinciding respectively with the upper, middle, and lower Potenza Valley and positioned in the vicinity of Roman towns and/or protohistoric centers.

The sample area in the upper Potenza Valley (extensive survey area: 17 km²; intensive survey area: 3.15 km²) is positioned within an intermediate basin between the Umbria-Marche Apennines and a lateral dorsal ridge. This fertile, hilly plain around the narrow Potenza is dominated by the hilltops of Monte Primo (1,300 masl) and Monte Castel Santa Maria (1,238 masl) (fig. 2). In Roman times, the intermediate basin was an important north–south connection between the Roman towns Camerinum (Camerino) and Matilica (Matelica). The middle Potenza Valley is characterized by a moderately hilly landscape, formed by dorsal ridges and secondary valleys. The sample area (extensive survey area: 18.80 km²; intensive survey area: 3.69 km²) is situated east of two hill spurs, on which the towns Treia and Pollenza developed during the Middle Ages. The Potenza River flows through a narrow corridor between these hill spurs and is dominated by the Monte Franco promontory, important in the Iron Age. The area north of the Potenza River probably belonged to the territory of the *municipium* Trea,[5] which was positioned on a dominant plateau immediately west of its successor, the medieval hilltop village Treia. Near Ricina (Villa Potenza), the hilly valley opens up into a large, open plain, flanked by the Apennine dorsals. The third sample area is located along the coast (extensive survey area: 32.70 km²; intensive survey area:

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[1] For the preliminary results of the PVS project, see Vermeulen and Boullart 2001; Vermeulen 2002; Vermeulen et al. 2002, 2005.

[2] Goethals et al. 2006.

[3] Feliciangeli 1908, 86.

[4] Dall'Aglio 2004, 75.

[5] Verdonck and Vermeulen 2004, 217.
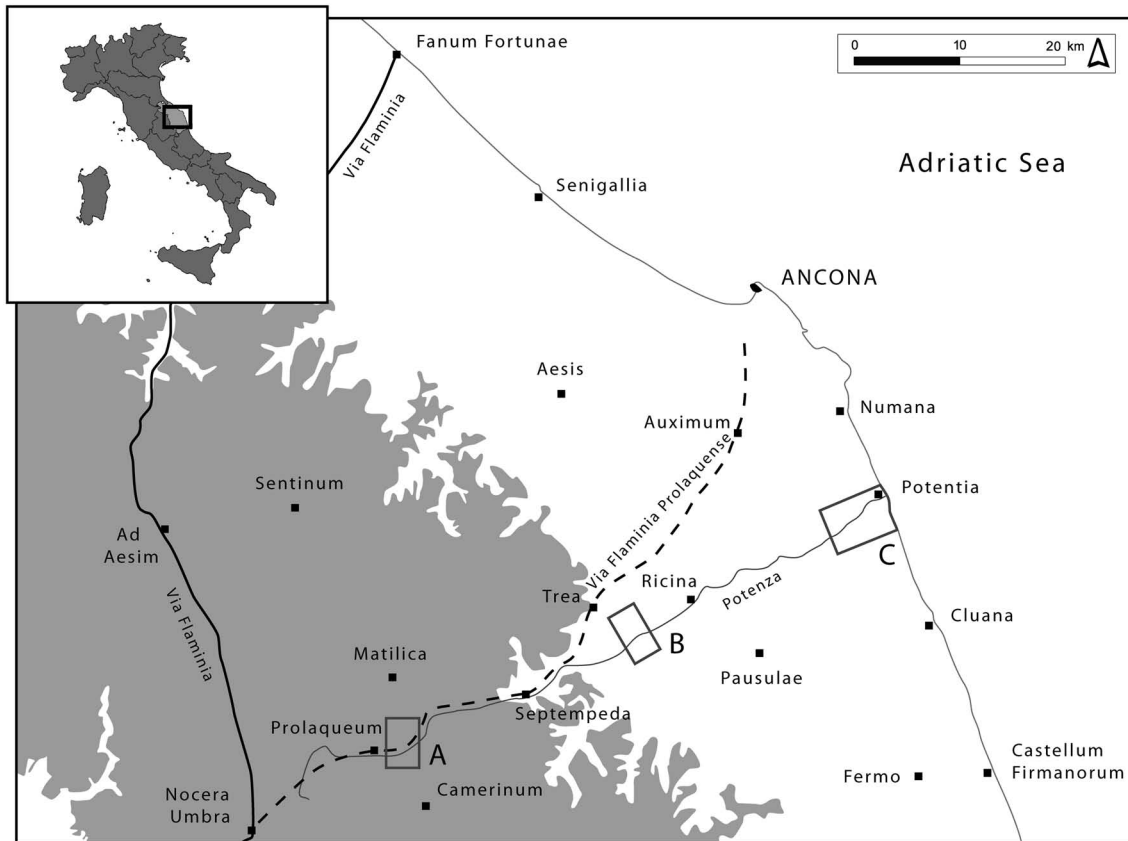
Fig. 1. Map of central Adriatic Italy, showing the Potenza River, the main Roman towns within the Potenza Valley, the Via Flaminia and Flaminia Prolaquense, and the most important sites mentioned in the text. Potenza Valley Survey sample areas: *A*, upper; *B*, middle; *C*, lower.

3.88 km²) and comprises the broad valley plain, delineated to the north by the Montarice and Colle Burchio hill ridge (fig. 3) and in the south by the Monte dei Priori and Monte Maggio, on which present-day Potenza Picena (235 masl) is located. The Roman town Potentia is situated within this sample area, which enabled us to investigate the close relationship between the colony and its immediate hinterland.

Problems with Site Identification

There are significant problems with site identification. Although systematic archaeological field survey using artifact pickups has proven to be the most effective tool for tracing occupation patterns, there are a number of factors hindering an optimal scan of the landscape. For example, processes of erosion and colluviation alter the landscape over time, covering or destroying sites, which is especially relevant in the hilly landscape of central Adriatic Italy. Within the lower Potenza Valley sample area, the attested repositioning of the Potenza River during the Medieval period also decreases visibility. In addition, modern surface use,

such as housing, roads, and some types of vegetation, covers and partly destroys the archaeological layer. Furthermore, site identification relies heavily on the survey methodology used; linewalking is very suitable for tracing Roman settlements of most of the Late

Fig. 2. Systematic survey in the upper Potenza Valley sample area with the Monte Castel Santa Maria in the background.

Fig. 3. A view of the plain of the lower Potenza Valley sample area confined by the Colle Burchio and Montarice hill ridge in the north.

Republican and Early Imperial periods, while protohistoric or Early Medieval sites require a more detailed approach, necessitating regular resurveys. Finally, site identification is highly dependent upon the analysis of the surface finds.[6] The chronological evaluation of the sites is based on the evidence of the material remains on the surface. Especially for some transitional periods, such as the Iron Age to the Republican period, or from late antiquity to the Early Middle Ages, there is a lack of representative dating material. As the identification of site chronology is often primarily based on the presence of fine wares, absence of such diagnostic pottery can result in major difficulties in dating. During the second and third centuries C.E., for example, there is a hiatus between the end of terra sigillata and the start of massive imports of African Red Slip Ware. In the northern and central Adriatic, the terra sigillata medio-adriatica, a regional fine ware, replaced terra sigillata but was apparently not distributed in large quantities in its initial phase of production.[7] For the Late Roman period, the most commonly studied dating materials are imported wares such as African Red Slip Ware and Late Roman C Ware and various African and Eastern amphoras. The clear drop of African Red Slip Ware imports around the mid fifth century C.E., especially in the hinterland, causes problems for

identifying site occupation. Regional pottery productions are far less abundant and are still understudied, making it very difficult to remedy the problem.

The study of Early Medieval settlement patterns is even more complex because of limited knowledge of seventh- to ninth-century dating material. Between the archaeologically attested sixth-century occupation in the plain and the High Medieval hilltop settlements, there is a hiatus. Patterson, who researched the Tyrrhenian side of the central Apennines, stated that the low visibility of the Early Medieval pottery, the limited amounts, the low quality, and differing scatter patterns are the main causes of the failure to locate Early Medieval peasant occupation in Italy.[8] Moreover, the Early Medieval hilltop sites are rarely ploughed and are often occupied by medieval villages and thus can not be traced through survey.[9]

Taking these problems with site identification into account, a good knowledge of local and regional pottery is crucial for identifying Late Roman occupation. This depends on a thorough analysis of finds from stratified contexts. Therefore, we studied the Late Roman finds from the excavations of Potentia, the Roman coastal colony situated within the lower Potenza Valley sample area. The Soprintendenza per i Beni Archeologici delle Marche excavated the monumental city

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[6] Alcock 2000.
[7] Brecciaroli Taborelli 1978.

[8] Patterson 2000, 110.
[9] Christie 2004, 10.

center of Potentia for more than 20 years. Analysis of all third- to sixth-century C.E. contexts of this important coastal site enabled us to create an overview of all imported Late Roman pottery and produce a chronological evaluation of the local and regional common wares.[10] This study revealed two general trends regarding the local common wares from the Potenza Valley. First, the fabric from the central Adriatic region seems to be characterized by the presence of chert or silex inclusions within the generally purified fabric. The presence of silex and river pebbles was typical for the Bronze and Iron Age pottery in the region and also occurred in the typical local pottery from the Republican and Imperial Roman periods. Second, during late antiquity, a decline in the number of forms seems to have occurred, a typical phenomenon for Late Roman pottery.[11] The most common forms were the multifunctional casseroles/bowls/lids with inclining rim (used to prepare and cook the food), cooking and storage jars with everted or flaring rim, and casseroles with upright wall and horizontal rim. Also executed in a local Late Roman coarse ware are the typical *clibani* (ovens) and the so-called incense burners. These new insights on the Late Roman regional common wares, based on the finds from Potentia, provide an excellent framework for the analysis of the artifact scatters of the Potenza Valley Survey project.

Site Typology

After completing a detailed analysis of the survey finds, the settlements were classified according to a site typology (table 1). This system, with sites ranging from the smallest house unit to the farm, villa, *vicus*, and town,[12] is based on various criteria such as the size of the artifact scatter, the quantity and quality of the surface finds (e.g., type of building materials, pottery groups, presence of fine objects), and several additional data (e.g., topographic position, presence of structures, some chronological data). These criteria inform us about the nature of the activities and the quality of life of the inhabitants.[13] Indeed, the size of the surface scatter is a valuable descriptor for the classification of sites, and it helps recover settlement networks. This parameter, however, has to be applied with caution, for the nature of waste disposal during site occupation, as well as post-depositional processes such as erosion activity, influence the spatial distribution of the finds. Moreover, one must also take into

account the diachronic character of many sites. Detailed survey can sometimes identify "chronozones," which can point to spatial relocation of occupation through time. In addition, the quality of the surface finds is indicative of the nature of the settlement, and the type of construction material used provides excellent evidence for the type of buildings and the complexity of the structures on the surface. When a certain zone has, for example, almost exclusively amphoras and dolia, a storage function can be suspected. Other rural activities may be indicated by certain small finds, such as instruments or quernstones. More industrial or specialized artisanal functions may be suggested by material from workshops, kilns, large presses, cellars, and related artifacts or refuse. Diachronic use is, however, very difficult to identify in such cases. Finally, the quality of life and social status of the inhabitants (proprietors or exploitation personnel) may be indicated by the nature of the small finds (e.g., fine pottery, glass, coins, art objects, inscriptions, sculpture). This system provided a good framework for interpreting the broad historical picture of the rural settlements during the Roman occupation of this valley.

THE SURVEY RESULTS

The Late Roman Settlement Pattern

Systematic fieldwalking within the three sample areas resulted in a dense pattern of probable and possible settlements from the protohistoric, Roman, and Medieval periods. Most prior knowledge regarding the Iron Age Piceni culture was based on funerary contexts, while little was known about the settlements. Some strategically positioned prestige sites, such as Monte Primo in the upper Potenza Valley, Monte Franco in the middle Potenza Valley, and Montarice at the mouth of the Potenza River, were known to be used during protohistoric times, although no intensive field research had been done. Through systematic survey within the three sample areas, by contrast, we were able to identify some 30 protohistoric settlements, by a combination of site identification and analysis of off-site phenomena.[14] For the Roman period, the combination of results from systematic survey, field checks of crop and soil marks revealed by aerial photography, and information from previous finds in the area, we identified 71 well-defined and nonproblematic Roman "settlement sites"; these identifications were based on the presence of artifact scatters and were classified

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[10] Verreyke 2005, 2007.
[11] Saguì 1998.
[12] The framework of the site typology of the PVS project was published in Verdonck and Vermeulen 2004, 208–14.

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[13] Trément 1993.
[14] For a detailed report on the analysis of the off-site phenomena, see Boullart 2006.

Table 1. Site Typology Used to Classify the Roman Settlements in the Potenza Valley Survey Project.

Type	Description	Size (m²)	Building Material	Pottery Finds	Associated Structures
1	small house unit	200–1,200; <700 avg.	simple (e.g., roof tiles, uncut stones)	very small amount (no fine wares)	–
2	farm	1,200–2,500	slightly more, mostly simple (e.g., roof tiles, [un]cut stones, brick)	normal variety (fine and common wares)	compact regular building
3	large farm or simple villa	2,500–4,000 (max.)	diverse (e.g., roof tiles, [un]cut stones, brick, concrete)	large variety (fine and common wares)	several functional units with living quarters, simple outhouses, and activity zones
4	*villa rustica*	3,000–6,000 (avg.)	great diversity e.g., *crustae, tesserae,* column fragments, tubuli)	larger variety (more fine and/or imported products); several cores of finds	one main building; one or more outhouses and activity zones (dominant position)
5	roadside settlement	3,000–6,000 (avg.)	large diversity	good variety (higher number of tablewares, amphoras, lamps)	longitudinal building aligned with a Roman road or bridge
6	small *vicus* or village	very large area (ca. 12,000 m²) with several concentrations	great diversity	great variety (more fine and/or imported products)	none (but connected with a Roman road)
7	town	–	–	–	–

according to the site typology.[15] The chronological refinement of the survey material allowed us to evaluate the changing occupation patterns. In the Potenza Valley, the dispersed settlement pattern associated with the Romans started to develop in the second century B.C.E. (tables 2–4). Especially in the lower valley, the installment of the colony Potentia gave rise to a dense network of Roman farms, small villas, and larger *villae rusticae,* typically located on well-positioned hill ridges and slopes near the edge of the valley plain. The maximum occupation density throughout the Potenza Valley occurred in the first century C.E., with a full rural typology ranging from small house units to larger villas, roadside settlements, and *vici.* Subsequently, a noticeable decline in occupation is observed from the second century C.E. onward, from the upper to the lower valley, followed by an all-time low during the third century C.E. A decline in the number of small sites, such as isolated house units and simple farms, seems to be typical for that era.

When we look at the occupation history of the Late Roman sites (table 5), we can see that all sites occupied during late antiquity were already occupied in the Early Imperial period; but in the upper Potenza Valley, for example, only one-third of the sites were continuously occupied up to the Late Roman period. These figures could indicate that after massive site abandonment in the second and third centuries C.E., caused by the well-noted economic crisis in Italy, favorably located sites were reoccupied when the economic climate revived. This seemingly massive decline in site occupation, however, is probably somewhat biased because of problems with the identification of second- and third-century pottery as noted above. It is plausible that some sites shrank, rather than being completely abandoned, leaving only small amounts of nondistinctive pottery, not visible within the large group of Early Imperial material. Moreover, the rural coastal sites seem to have been more resilient during and after the third-century crisis, as some 50% of the

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[15] A detailed site catalogue of all sites identified by the PVS project was recently published in Vermeulen et al. 2006.

Table 2. Number of Identified Roman Sites in the Upper Potenza Valley Sample Area by Chronological Phase.

Site Type	Total	Late Republic	First Century C.E.	Second Century C.E.	Third Century C.E.	Fourth Century C.E.	Fifth Century C.E.	Sixth Century C.E.
Small farm	9	1	9	4	1	1	2	0
Farm	13	5	13	7	0	3	3	0
Large farm/ small villa	10	4	10	8	2	5	1	0
Villa rustica	2	2	2	2	1	1	1	0
Total	34	12	34	21	4	10	7	0

Table 3. Number of Identified Roman Sites in the Middle Potenza Valley Sample Area by Chronological Phase.

Site Type	Total	Late Republic	First Century C.E.	Second Century C.E.	Third Century C.E.	Fourth Century C.E.	Fifth Century C.E.	Sixth Century C.E.
Small farm	2	0	2	0	0	0	0	0
Farm	4	2	4	2	1	1	1	0
Large farm/ small villa	3	2	3	2	0	1	0	0
Villa rustica	3	1	3	1	0	1	1	0
Roadside settlement	1	1	1	1	0	0	0	0
Vicus	1	0	1	0	0	0	0	0
Total	14	6	14	6	1	3	2	0

Table 4. Number of Identified Roman Sites in the Lower Potenza Valley Sample Area by Chronological Phase.

Site Type	Total	Late Republic	First Century C.E.	Second Century C.E.	Third Century C.E.	Fourth Century C.E.	Fifth Century C.E.	Sixth Century C.E.
Small farm	5	0	5	2	0	0	1	0
Farm	5	3	4	4	0	1	1	0
Large farm/ small villa	6	6	6	6	3	5	5	0
Villa rustica	6	6	6	4	3	5	4	3
Roadside settlement	1	1	1	1	0	1	1	0
Total	23	16	22	17	6	12	12	3

Table 5. Occupation History of the Late Roman Settlements in the Upper, Middle, and Lower Potenza Valley Sample Area.

Sample Area	Proto-history	Late Republic	First Century C.E.	Second Century C.E.	Third Century C.E.	Fourth Century C.E.	Fifth Century C.E.	Sixth Century C.E.	Middle Ages
Upper valley	3	7	12	10	4	11	6	0	3
Middle valley	3	4	7	5	3	7	2	0	1
Lower valley	5	12	14	13	6	10	12	3	1
Total	11	23	33	28	13	28	20	3	5

Imperial sites were (still) occupied in the Late Roman period. It is striking that mainly the larger sites, such as the large farms and villas, were occupied in the fourth and fifth century C.E., while the small house units and smaller farms were apparently definitively abandoned. In any case, our research suggests that after occupation reached its high point around the first century C.E., no new sites were founded, which points to a lack of investment in the countryside. After the revival in the fourth century C.E., there was a rapid decline during the second half of the fifth century C.E., when it seems that many settlements were permanently abandoned. A certain fluctuation in the Mediterranean exchange system during the fifth century C.E. probably influences our data. The decline of imported goods, which did not reach the hinterland of the coastal area after the mid fifth century C.E., may limit our ability to identify subsequent occupation. In the fifth and sixth centuries C.E., the hinterland (particularly) fell back upon local pottery productions and regional exchange patterns. This type of pottery is extremely hard to date and may not even be recognized. In addition, these ceramics are only present in very small quantities in comparison with the large amounts of pottery waste from Roman times. As Fentress notes, since most of the surface finds can be placed within broad chronological lines, we can assume that we are not missing massive amounts of Early Medieval ware because of an inability to identify the finds.[16] Another acute problem is that the Early Medieval centers often developed into medieval towns, occupied up to the present day, which mask the earliest stages of occupation.[17] It is clear that the Early Medieval occupation is almost impossible to trace through regular artifact survey. Only from the 10th century C.E. onward do settlements and farms seem to reappear on the survey map, thanks to the presence of a more uniform central Italian pottery production.[18]

In general, the location of Late Roman settlements over the Potenza landscape does not differ much from Early Imperial times. There is a concentration of rural sites near contact zones of different landscape types, such as the border zones between the valley bottom and the hill slopes where the advantages of the natural environment can be used. For example, in the upper Potenza Valley sample area (fig. 4), the large Roman settlements were mainly situated around the 375–405 m contours, where the abundant natural springs could be fully used. Within the lower Potenza Valley sample area (fig. 5), where we could investigate the immediate rural hinterland of the town of Potentia, there is a dense pattern of rich rural settlements along the adjacent hill ridges, aligning the centuriated valley plain.[19] The favorable location near the coast clearly translates into a dense settlement pattern in Roman and Late Roman times. When we look more closely at site dispersion and topographic setting of the settlements, we note the apparent importance in all sample areas of the road network for the success of a longer site occupation during late antiquity. This phenomenon is best seen in the middle valley sample area (fig. 6). Here, the Flaminia Prolaquense turned north toward the *municipium* Trea, immediately west of our sample area. Another road probably continued along the northern side of the Potenza River, connecting Septempeda with Potentia via the town of Ricina. Along this road, a series of roadside settlements could be identified (see figs. 6[A], 7), and good data from

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[16] Fentress and Cambi 1989, 80–1.
[17] Christie 1989, 283.
[18] For coin-dated evidence from Matelica, see Mercando
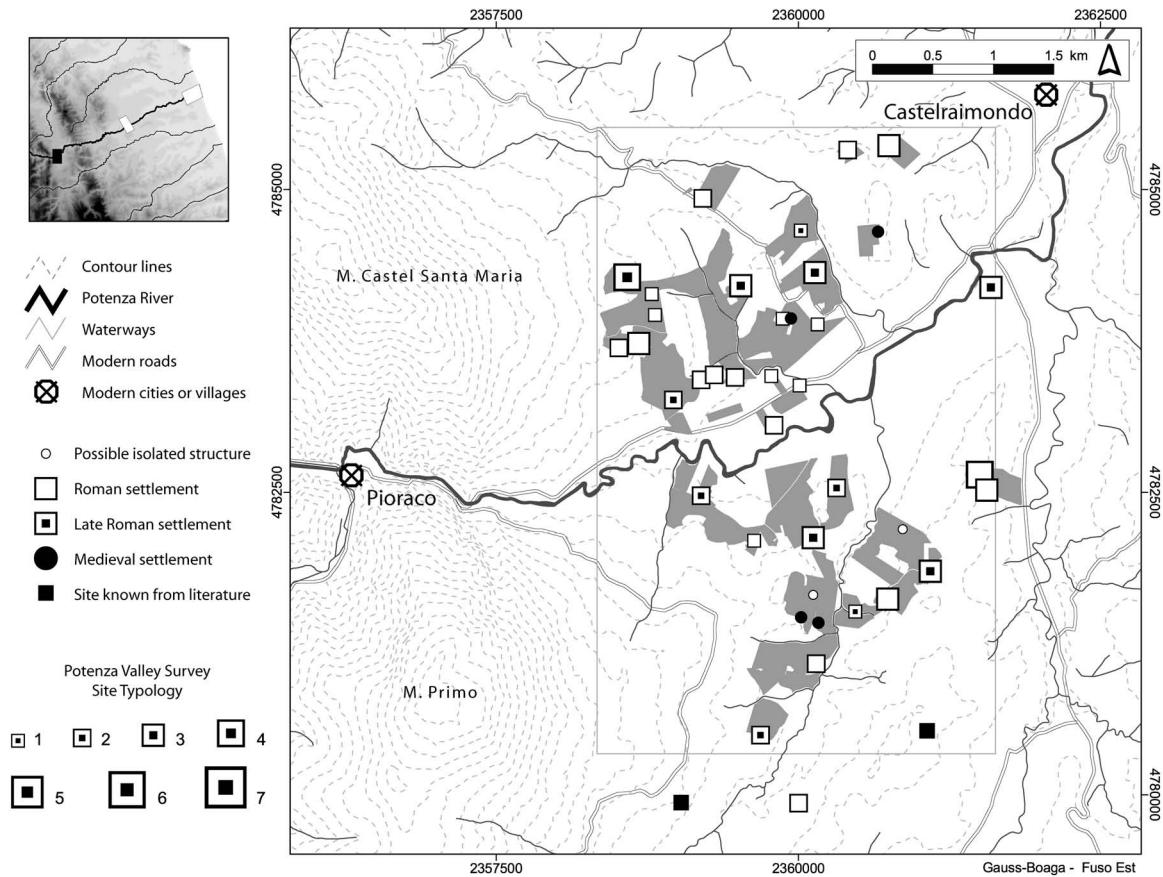
1970.
[19] Alfieri 1970.

Fig. 4. Location of Roman, Late Roman, and medieval settlements within the upper Potenza Valley sample area (see table 1 for site typology definitions). The systematically surveyed fields (linewalking) are shaded.

aerial photography, backed by rescue excavations in summer 2007, enabled us to identify a possible *vicus* along the Roman west–east road near Passo di Treia (see fig. 6[B]). This identification as *vicus* is supported by the soil and crop marks visible on aerial photographs, which also suggest the presence of a bifurcation of the Septempeda–Ricina road toward the north, in the direction of Roman Trea. South of the Potenza, on the eastern slopes of the Monte Franco, dominating the corridor between the two hill spurs, we identified a large villa (see fig. 6C). It is clear that this entire area—Monte Franco, the Potenza corridor, Roman *vicus,* and Trea—was an important strategic north–south passageway. This is also illustrated by the fact that important protohistoric settlements were located along this line. It is probably not a coincidence that these same sites were also occupied during Late Roman times. Recent research in southern France has demonstrated that it is very hard to distinguish large

villas and *vici* or secondary agglomerations from surface evidence,[20] even when using a series of discriminating parameters such as building materials, variety of artifacts, indications of functions performed, and duration of occupation. Only the wider picture of territorial occupation, site networks, and the connection to the roads, which were used for long-distance transport and local land exploitation, provides insight on the characteristics of the settlement pattern. In our research, additional information on the Roman road network, provided by aerial photographs, allowed a better understanding of these semirural (central) sites and the role they played in the landscape.

CONTEXTUALIZING THE SURVEY RESULTS
Other Sources of Evidence
    While survey provides an overview of settlement dispersion and changing occupation patterns through time, it does not provide evidence for the appearance
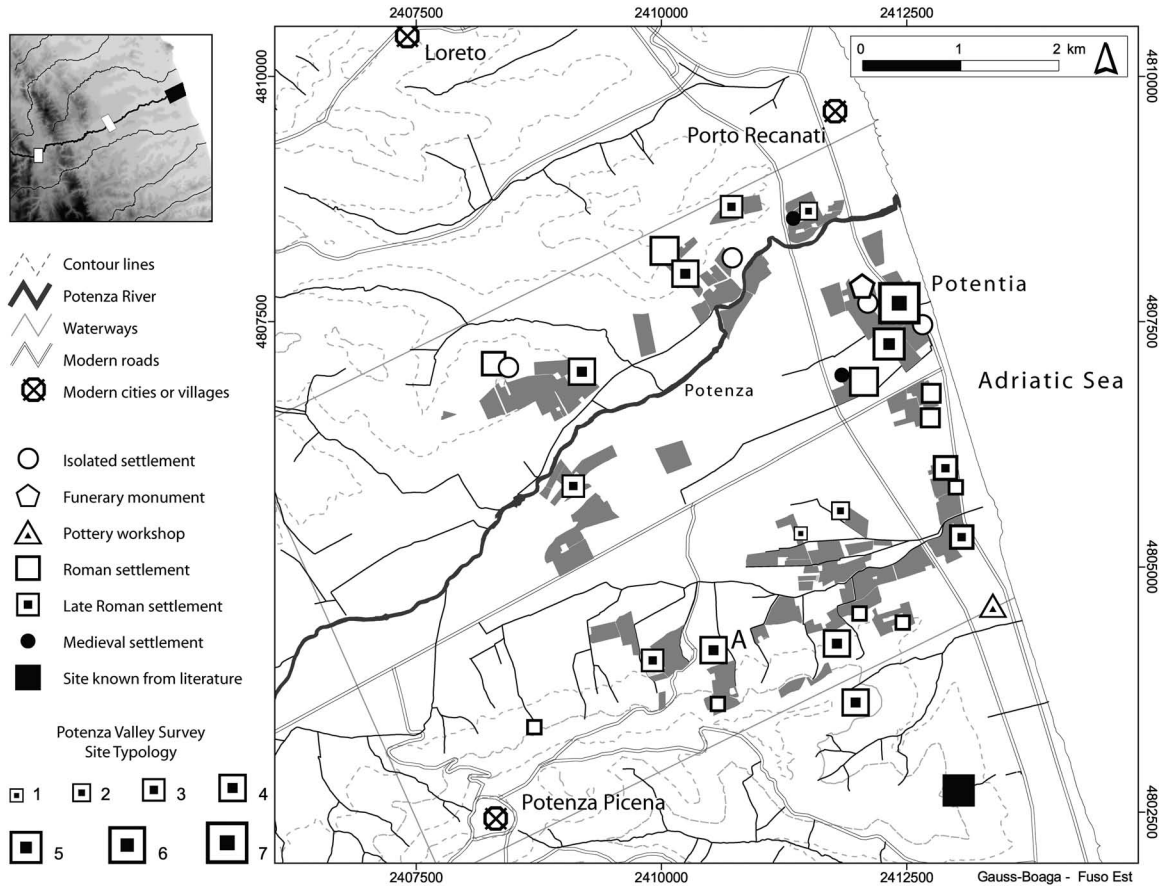
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[20] Bertoncello 2002.

Fig. 5. Location of Roman, Late Roman, and medieval settlements within the lower Potenza Valley sample area: *A*, Late Roman site at San Girio church. The systematically surveyed fields (linewalking) are shaded.

of the *vicus*, villa, or farm or what role such settlements played within the local rural economy. To answer these questions, we need to integrate the survey results into a broader framework. Connecting the survey data with information from excavations and written documents gives us a better understanding of the developments in the Late Roman countryside of this part of central Adriatic Italy.

The information from ancient written sources is scanty and mostly limited to the Republican and Early Imperial periods. But combined with the archaeological record, it gives us some idea of the types of regional agricultural activities. We learn, for example, that the surplus of Picenum wine and large olives was widely exported. A batch of small dolia with *tituli picti Oliva/ Picena/++[. .]ti* were found as far north as Metz (Gallia Belgica).[21] We have attestations of the export of wine

in the forms of the late second-century B.C.E. Lamboglia 2 and late first-century B.C.E. Dressel 6A amphoras. Workshops for these types of amphoras were located in Fermo, Cupra Marittima, and probably also Potenza Picena.[22] From the first to third and maybe fourth centuries C.E., Picenum wine was probably also transported in wine amphoras with flat bottoms,[23] which were especially typical of Emilia-Romagna. By late antiquity, however, wine from Adriatic central Italy was probably only exported on a small scale. Saint Ambrose (*De Tobia* 17), for example, referred to Picenum wine as an exotic luxury product.[24]

What can we deduce about the distribution of Roman sites from other contextual evidence and especially excavations? In the early 1980s, Mercando, Brecciaroli Taborelli, and Paci published a list of all known Roman rural settlements in the modern Italian

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[21] Albrecht 1998; Paci 2005, 32.
[22] Cipriano and Carre 1989.

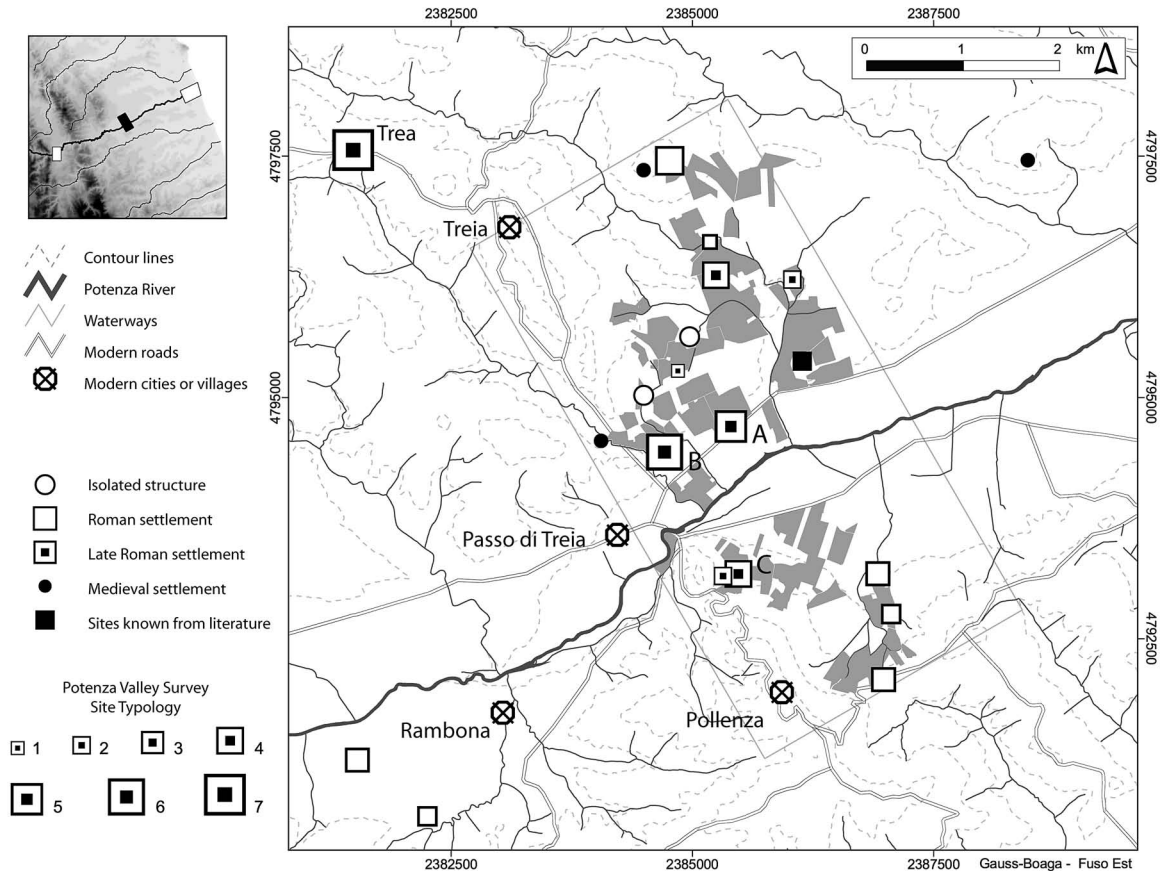[23] Mercando 1982.
[24] Alfieri 1992, 122–23.

Fig. 6. Location of Roman, Late Roman, and medieval settlements within the middle Potenza Valley sample area: *A*, road-side settlement; *B*, possible *vicus*; *C*, Late Roman villa. The systematically surveyed fields (linewalking) are shaded.

Marche region, comprising large parts of the ancient Regio VI Umbria and Regio V Picenum.[25] Their aim was to map the distribution of Roman sites in this area based on written and archaeological sources. Hard data from excavations remain quite limited in this part of Adriatic Italy. The rescue excavations of the rural sites of Cone di Arcevia, Castelfidardo, Potenza Picena, and San Benedetto del Tronto, exhaustively published in 1979,[26] have since then been supplemented only by the recent publications of Monte Torto (Osimo)[27] and Colombarone near Pesaro.[28] Several regional archaeological surveys have been conducted in the region (mostly in northern Marche, in the valleys of the Misa [Senigallia], Nevola, and Cesano [Suasa],[29] and the Metauro [Fano]),[30] which combine bibliographical research

with selective terrain work. Within the Potenza Valley, the University of Macerata surveyed the area west of the *municipium* Trea.[31] Recently, large systematic surveys were also done in the Foglia Valley (Pesaro),[32] the Tenna, Ete, and Aso Valleys (Pisa University), and in the upper Esino Valley (Oxford University).

Decline and Revival

The decline of the number of sites from the second and third centuries C.E. identified through survey has been attested all over the Italian peninsula by many regional surveys.[33] We have already stressed that survey results are possibly biased because of the lack of material datable to the third century C.E.; however, data from excavated villa sites seem to confirm this

[25] Mercando et al. 1981.
[26] Mercando 1979.
[27] Pignocchi 2001.
[28] Dall'Aglio 1985; Dall'Aglio and Vergari 2001.
[29] Dall'Aglio et al. 1991.

[30] Luni 1993.
[31] Moscatelli 1988.
[32] Campagnoli 1999.
[33] For south-central Adriatic Italy, see Barker 1995.

Fig. 7. Soil marks of a roadside settlement and the road connecting Septempeda with Ricina.

crisis in rural settlement. The *villa rustica* at the Monte Gelato (Lazio)[34] was almost completely abandoned in the third and early fourth century C.E. This was also the case at Settefinestre, in Tuscany,[35] at Matrice, in Molise,[36] and at San Giovanni di Ruoti, in Basilicata.[37] Therefore, it appears that the dispersal of Early Imperial settlements seems to have been profoundly disturbed by the third-century crisis (esp. in 240–280 C.E.). The cause of this third-century decline and subsequent nucleation of settlement in the fourth century C.E. has been the subject of scholarly debate. In the past, textual evidence on burdensome taxation, *agri deserti*, and *coloni* has led to the conclusion that there was a massive depopulation of the countryside.[38] According to this reading of the evidence, the free peasant farmers were ruined and became oppressed tenants on the large estates of the increasingly rich landowners. Within the past few decades, however, this picture has been adjusted, thanks to increasing research on the Late Roman rural economy, large survey projects, and excavations of rural sites. Currently, scholars agree that the third-century decline was probably caused by a combination of factors such as taxation, invasions of "barbarian" tribes, war, and a shortage of manpower.[39] A massive depopulation of the countryside is probably an exaggeration. The *agri deserti* from the texts were probably only marginal tracts of land falling out of use. Moreover, the reorganization of the rural landscape and agriculture following the third-century crisis gave

rise to the renewed growth and expansion of rural settlements in the fourth century C.E.[40]

It is important to realize that the subsequent renewed economy of the fourth century C.E. did not translate into an equivalent increase in the number of rural sites throughout the Italian peninsula. We must take into account that the large Late Roman estates (*massae*) were probably rather exceptional for central Adriatic Italy. The *massa fundorum*, probably consisting of an agglomeration of *fundi*, was typical of rich landowners and aristocrats within high levels of the administration and the military.[41] There is one sixth-century reference to anonymous ecclesiastical *massae* in internal Picenum in the vicinity of Cingulum (Cingoli), and researchers agree that the Late Antique *massae* were mainly restricted to southern Italy and Sicily.[42] Within the Biferno Valley Survey, a rise in villa occupation in the fourth century C.E. appears, but according to Barker, the excavated villas in the area, such as Matrice, show a rather modest fourth-century phase.[43] The large *latifundiae* probably never developed in this region. The written sources and the data from our survey and from excavated sites all point to the conclusion that small- and medium-sized estates prevailed in central Adriatic Italy.

The Transformation of the Villa

Research throughout the Mediterranean has shown that in many regions, the villas of Imperial times underwent radical transformations during late antiquity. They experienced drastic changes not only in style and building techniques but also in function. Certain areas in the *pars urbana* (often even in the richest and most decorative quarters) were used for agricultural activities or industrial production. The clear distinction between the luxurious residential area and the utilitarian building often disappeared. Oil presses, dolia, hearths, pottery kilns, ironworking furnaces, fish-processing tanks, and cisterns were installed in former living areas. These structures were built within the peristyle or the bathhouse, despite the presence of mosaic floors there.[44] Some of the same additions appear in the villa of Pollenza-S. Lucia (Macerata) in the Chienti Valley of central Adriatic Italy; for example, at some time in the fourth century C.E., an olive oil press and sink were placed within the living quarters, destroying the

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[34] Potter and King 1997.
[35] Carandini 1985, 183–85.
[36] Roberts 1992.
[37] Freed 1982; Gualtieri et al. 1983.
[38] Christie 2004, 11.
[39] Wickham 2005, 520–21.

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[40] Vera 2001, 627.
[41] Banaji 2002, 172.
[42] Alfieri 1981, 232; Vera 2001, 614–16.
[43] Barker 1995, 225.
[44] Brogiolo and Chavarría 2003, 33.

black-and-white geometric mosaic of Augustan date.[45] At the *villa suburbana* (La Grotta) at Falerio Picenus (Falerio), the living quarters were transformed into rooms for agricultural use.[46] The opposite evolution is illustrated by the coastal villa at Cupra Marittima (S. Basso), where a first-century B.C.E. olive oil or wine press in an *opus spicatum* floor was covered by a thermal complex in the fourth century C.E.[47] The apparent expansion of the living quarters with a luxurious bathhouse also demonstrates the growing economic prosperity of the coastal area.

Also typical from the late fourth century C.E. onward is the placement of burials within or adjacent to the villa. On rare occasions, the site was completely abandoned and covered with a sizeable cemetery. Also typical was the combination of a burial ground with a new occupation quarter constructed of ephemeral materials. The presence of burials does not indicate that the settlement was abandoned; for example, the new elite villa with fifth-century tower at S. Vincenzo al Volturno was positioned only a few meters away from the church and burial ground.[48] In Romagna, there are several examples of villas, such as those at Russi or Forlimpopoli (Via Marconi), which saw parts of their grounds converted for use as burial grounds during late antiquity.[49]

A widely attested phenomenon is the transformation of a former villa into an Early Christian church, often in combination with burials.[50] A good example is the Mola di Monte Gelato site north of Rome. This Augustan villa was dismantled in the early third century and subsequently reoccupied in the mid fourth century C.E.; a small church was constructed there in the beginning of the fifth century C.E.[51] Fiocchi Nicolai suggested that the early fifth-century church there was associated with a nearby *vicus*.[52] Augenti argues that the former villa, once it was transformed into a church and/or cemetery, and the other villas in the area could also have functioned as outposts controlling the surrounding estate, while the estate owners lived elsewhere, perhaps in the Early Medieval hilltop villages or *vici*.[53] Within the lower Potenza Valley sample area, a large Roman and Late Roman artifact scatter,

probably associated with a *villa rustica*, is situated in the immediate vicinity of the San Girio church (see fig. 5[A]).[54] The abundant spolia and Early Christian art within the church might well suggest the implementation of an Early Christian rural church within or in the direct vicinity of this Late Roman villa.

The Era of Transition

In the Potenza Valley, the number of sites declined considerably from the mid fifth century C.E. onward. We have already pointed out that the data might contain a bias caused by the overall decline of imported products beginning in the mid fifth century C.E., which reduces the amount of datable pottery. In the upper and middle valley sample areas, the later African Red Slip types are almost completely absent, but the coastal area also sees a remarkable drop, partially compensated for by the import of the eastern Late Roman C Ware. The excavated rural sites within the region again confirm the trend visible in our survey data. For example, at the rural site of Cone di Arcevia, the destruction layers in and surrounding the subterranean room (Room L) consist of a homogeneous mid fifth-century C.E. context.[55]

The sixth century C.E. can be seen as the era of transition between the Late Roman period and the Early Middle Ages. In the lower valley, only two sites, according to our data, were possibly occupied up to the first half of the sixth century C.E. The scarcity of datable artifacts from the later fifth and sixth centuries is probably partly responsible for this noticeable drop in identified sites. At Castelfidardo, the disturbed upper layers of a rural site displayed a rich set of fifth- and early sixth-century pottery. The detailed excavation report notes several hearths and "squatter" occupation. This suggests that the site was still occupied after the mid sixth century C.E.; however, the level of material culture was extremely low compared with the previous occupation.[56] Survey is in fact not suitable for mapping sixth-century rural occupation, since the small number of finds and the ephemeral character of the occupation are not visible on the surface. In the lower Potenza Valley, however, where

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[45] Mercando 1989, 40, figs. 1, 2.

[46] Pupilli 1996, 59–60.

[47] Frapiccini 2000.

[48] Lewit 2003, 260–74; 2005, 251–54; Christie 2004, 20.

[49] Guarnieri 2004, 25–6, fig. 4; Augenti et al. 2005, 19, fig. 3.

[50] Lewit 2005, 251–54. Webster and Brown (1997, 31) state that this phenomenon of rural churches might have been stimulated by the beliefs of the landowner or by the quality of the villa structures.

[51] Christie 2004, 13.

[52] Fiocchi Nicolai 1999, 464–66, fig. 5.

[53] Augenti 2003, 289–90. Pellecuer and Pomerades (2001) developed an interesting model for the spatial organization and development of Late Antique rural churches on former villas, based on the evidence of southern France. According to Augenti (2003, 291), this model is also valid for Italian villas.

[54] Pacini 1991.

[55] Mercando 1979, 92–109, figs. 7–10, 13–19.

[56] Mercando 1979, 135, figs. 59–75, 83, 84b.

we could investigate the Roman town Potentia and its immediate rural hinterland, we see the contemporaneous failure of the town and its related countryside. Based on the analysis of the finds from the excavated monumental city center, combined with the occupation pattern suggested by the grid survey, we can conclude that the town declined considerably during the sixth century C.E.

In central Adriatic Italy, the impact of the Gothic-Byzantine war must not be underestimated, for it was a wide-ranging conflict, damaging the entire Italian peninsula.[57] Destruction layers at villas such as San Giovanni di Ruoti (Basilicata),[58] Monte Gelato (Lazio),[59] Monte Barro (Lombardy),[60] and the Villa Agnuli (Puglia)[61] were all probably associated with the Gothic-Byzantine war. Some were subsequently reoccupied; others were permanently abandoned. Within the Marche region, the villa at Monte Torto (Osimo)[62] was completely abandoned during the sixth century C.E., probably because of the effects of this war. Procopius did not mention any specific details regarding the effects of the war on the countryside, but he did record several cases of famine. The inhabitants of inland Tuscany were processing oak acorns to make bread,[63] while people from Flaminia et Picenum Annonarium were eating grass to fight the hunger.[64] He also mentioned that when the Ostrogoths of Vitige retreated from Rome to Ravenna in 538 C.E., they made detours not only to prevent the encounter with enemy troops but also to provision the army.[65] When a military operation took place within a region, rural sites and villages were pillaged, sacked, and confiscated to provide for the troops. This led to famine and a depopulation of the countryside. In 536 C.E., Cassiodorus (*Var.* 12.27) wrote a letter to the bishop of Milan, stating that measures were to be taken to help the starving population.[66]

It is clear that these devastations of the landscape had a grave impact on the rural population. Feller remarked that the end of the regional circulation of goods within the Italian peninsula, a situation caused by the many boundaries and general political instability, accelerated the failure of the Late Roman agricultural system.[67] After the war, Justinian took action to stimulate the Italian economy and increased tax

collection to pay for costly military action. In reality, these efforts were fragmented and directed only toward the strategic sites, senatorial estates, and large urban centers of the peninsula.[68] Potentia and its related countryside were probably not resilient enough to survive the destruction of the war. From the late sixth century onward, the Lombards dominated central Adriatic Italy. The hill ridge between the Musone and Potenza Rivers became a boundary between the Lombard Duchy of Spoleto and Byzantine Pentapolis.[69] Scholars now agree that the division of Italy between Lombards and Byzantines might have been the result of an economic regionalization initiated prior to the Lombard conquest. The Lombards simply took over the economically weak areas that had already lost their link with the Mediterranean in the course of the sixth century C.E.[70]

This hypothesis is certainly confirmed by the results of the Potenza Valley Survey, which indicate that the Late Roman dispersed settlement pattern already dissolved around the mid sixth century C.E. How exactly the Roman pattern, with valley-plain towns surrounded by rural estates, evolved into the characteristic medieval village system remains unknown. The most probable hypothesis is that occupation shifted gradually toward the nucleated hilltop villages. At present, however, there is no conclusive archaeological evidence of a network of villages dated between the seventh and ninth centuries within the Duchy of Spoleto.[71] Our main sources of information on Early Medieval society in the central Adriatic are the written documents, medieval church records, toponyms, and dispersed Early Medieval finds. These data, combined with our survey results, can, however, shed some light on Early Medieval society.

In the Potenza Valley, the strategic importance of the Apennine corridor and the natural passageways seems to have been a defining factor for the continued occupation from Roman times into the Middle Ages in this area. After Camerinum was taken by the Lombards in 591 C.E., it became an important *gastaldato* (controlling administrative center) of the Duchy of Spoleto.[72] The Via Flaminia was controlled at Nocera Umbra, forcing the Byzantines to use the alternative connection between Rome and Ravenna,

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[57] Christie 2004, 25.

[58] Freed 1982; Gualtieri et al. 1983.

[59] Potter and King 1997.

[60] Brogiolo and Castelletti 1991.

[61] Volpe et al. 1998, 723–34.

[62] Pignocchi 2001.

[63] Procop. *De Bellis* 6.20.18–22.

[64] Procop. *De Bellis* 6.20.30–1.

[65] Procop. *De Bellis* 6.11.9.

[66] Bocci 2004, 53.

[67] Feller 2003, 216.

[68] Arthur 2004, 125.

[69] Baldetti 1983.

[70] Delogu 1990, 145; Marazzi 1998; Wickham 2005, 209.

[71] Feller 2003, 221.

[72] Paul the Deacon *Historia Langobardorum* 4.16.

the Via Amerina. Further downstream, the Flaminia Prolaquense crossed the Camerinum–Matilica road at the intermediate basin, connecting Spoleto with the eastern Marche.[73] The necropoleis at Nocera Umbra, comprising both indigenous people and Lombard warriors, and the graves at Laverino attest the Early Medieval occupation in the Apennine corridor.[74] Our survey has shown that several present-day hilltop villages show High Medieval material in the direct vicinity, while toponyms and/or nearby Roman artifact scatters suggest occupation continuity from Roman times onward. We must not forget that the towns controlling the area of the upper Potenza, namely Camerinum and Matilica, both show continued occupation up to the present day. The Roman towns Septempeda and Trea, which were located farther along the diverticulum of the Via Flaminia, were abandoned during the Early Middle Ages; both cities, however, do display evidence of religious continuity.[75] In Trea, the present-day church of SS. Croccifisso covers the former temple for an Egyptian cult, which was located within the Roman circuit walls. Many Roman spolia and statues of Isis and Serapis are incorporated into the present-day church. At Septempeda, the San Lorenzo abbey is probably located on top of a former pagan temple, situated on the forum and aligned along the Flaminia Prolaquense.[76] It seems that the natural corridor and passageways, already of strategic importance during pre- and protohistory, also proved to be a vital factor for the development of the Early Medieval settlements.[77] The coastal site Potentia, however, which used to benefit from its role as sea-trade center, lost its connections to the Mediterranean exchange system and was abandoned in favor of the nearby protected hilltop settlements Villa Potenza and Recanati.

CONCLUSION

Tracing Late Roman rural occupation depends on the primary dating materials, which are still the local fine wares and imported tablewares and amphoras. Local and regional common wares remain understudied in Adriatic central Italy. Our approach of exhaustively analyzing reference material from Potentia was rewarding. The analysis of the imported wares present at this coastal city, as well as the chronological classification of the local common wares, provided an excellent framework for identifying Late Roman artifact scatters within the Potenza Valley. Nonetheless, several biases within the survey data, caused by the yet unre-solved lack of datable pottery for particular periods, the scarcity of Late Roman material on the surface, and fluctuations within the Mediterranean exchange system remain.

Some general traits nonetheless appear. In the Potenza Valley, as well as in many similar valleys between the central Apennines and the Adriatic Sea, many of the undefended or economically less viable settlements in the countryside were probably abandoned during the unstable third century C.E. as a result of a combination of factors, such as economic decline, difficulties of maintaining an equilibrium between production activity and landscape exploitation, feelings of insecurity due to the disastrous internal political situation, and several incursions by barbarians. It is clear that some of the settlements were reoccupied or reused during the fourth century C.E. The pattern emerging from the site classification typology suggests that the larger farms and villas were inhabited, while the small settlements were definitively abandoned. In the course of the fifth century C.E., the network of larger domains seems to disintegrate because of the changing economic reality and insecurity. This progressive abandonment is most evident in the valley bottom and in some coastal areas where defenses are poor, and constant (hydraulic) interventions are necessary to keep human presence and production activity above a certain level.

We have demonstrated that when raw survey data, which only give information on broad settlement patterns, is combined with relevant written documents and data from excavated sites, it allows a better understanding of the developments of the Late Roman rural landscape; but many questions remain. In the present state of research, it is very difficult to estimate the effects of the third-century crisis on land organization. The revival of the agricultural economy during the fourth century C.E. is marked by a higher number of occupied large farms or villas, though it is difficult to evaluate the settlement size and impossible to trace the existence of estates made up of multiple farms. Surface survey does not provide adequate answers to these questions. Data from excavated farms and villas in the central Adriatic suggest that these settlements transformed considerably during late antiquity. When interpreting artifact scatters of multiperiod sites, we must take into account the fact that the surface collection might not be a representative sample of the actual occupation nor reflect the settlement size. Moreover,

[73] Dall'Aglio 2004, 91.
[74] Conversi 1993, 18.
[75] Baldetti 1983, 16–17.

[76] Fabrini 1990; Neri 2004, 349.
[77] Pani Ermini 2003, 720.

the size of the artifact concentration is often marked by broadly dated Roman pottery, while the Late Antique occupation phase is identified based on the presence of a small percentage of recognizable and datable Late Roman pottery, thus making it very difficult to delineate the actual Late Roman occupation area. Systematic coring on a number of continuously occupied sites and test excavation spread out over a large area might illuminate the character of the settlement and estate size.

To conclude, we can state that regional diversity is the key element for understanding the changing occupation patterns of the Late Roman period. The economic reality of a region, largely determined by its geography, natural resources, and the fertility of its agricultural land, was a crucial factor for development and growth. The hilly landscape of the central Adriatic was probably more suited for an agricultural production combining different types of produce, which resulted in a dense network of medium-sized estates. The economic vitality also determined the resilience of a region after damaging invasions or war. In central Adriatic Italy, the Gothic-Byzantine war was probably devastating for the agricultural development and related exchange pattern. When the Lombards settled south of the Musone in the late sixth century C.E., the economy of south-central Adriatic Italy was probably already severely weakened and its Roman pattern partly erased.

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