

4-19-2018

Rough Cilicia Archaeological Survey Project: Report of the 2003 Season

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Recommended Citation

Rauh, Nicholas K., "Rough Cilicia Archaeological Survey Project: Report of the 2003 Season" (2018). *Rough Cilicia Archaeological Survey Project, 1996-2011*. Paper 10.
<http://dx.doi.org/10.5703/1288284316726>

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The Rough Cilicia Archaeological Survey Project Preliminary Report of the 2003 Season

Nicholas K. Rauh, Purdue University

The Rough Cilicia Archaeological Project conducted archaeological and geoarchaeological research in the Gazipaşa district (Antalya Province, south coastal Turkey) from July 21 through August 21 2003. Our service representative was Levent Vardar from the General Directorate for Monuments and Museums in Ankara. Project personnel this season included Dr. Matthew Dillon (Loyola Marymount University), Dr. Martin Doyle (UNC-Chapel Hill), Dr. Tim Filley (Purdue University), Dr. Michael Hoff (University of Nebraska at Lincoln), Dr. F. Sancar Ozaner (Tubitak in Ankara), Dr. Rhys Townsend (Clark University), Art Krispin, (M.S. in Electrical Engineering, University of Southern California) Edward Connor (M.S. in Geography, Clark University), Matt Douglass (MA student in Anthropology, University of Nebraska at Lincoln), Ben Koziol (undergraduate in Anthropology, University of Nebraska at Lincoln), Anna Drozda (undergraduate in Art History, University of Nebraska at Lincoln), Josh Brown (undergraduate in Forestry, UNC-Chapel Hill), Sarah Wood (MA student in History, Purdue University), Beliz Tecirli (undergraduate in Archaeology, University College London), Trevor Thomas (undergraduate in Classics, Purdue University), and Tony Millus (undergraduate in History, Purdue University).



Figure 1: 2011 RCSP Project personnel: from left to right, Eddie Connor, Anna Drozda, Rhys Townsend, Beliz Tecirli, Levent Vardar (in back), Tony Millus, Ben Koziol (kneeling), Matt Douglass, Trevor Thomas (in back), Matt Dillon, Michael Hoff (in back), Martin Doyle

The Rough Cilicia Survey Team is investigating the role of Rough Cilicia as a production region to the ancient Roman Mediterranean economy. Our investigative methods this season included remote sensing of satellite imagery; surface, geomorphological, and maritime survey; charcoal analysis of ceramic production residue for timber identification; and biogeochemical analysis of regional terrestrial vegetation preserved in sediments. Work to date has identified crucial indicators of economic production activities associated with the renewable resource of timber (particularly cedar) from Cilician mountain forests. To refine this question, the project is examining the basin of the Biçkici River (modern Gazipaşa, Turkey) as a zone of ancient industrial development (see figures 2-3). Our research was funded by a grant from the U.S. National Science Foundation.

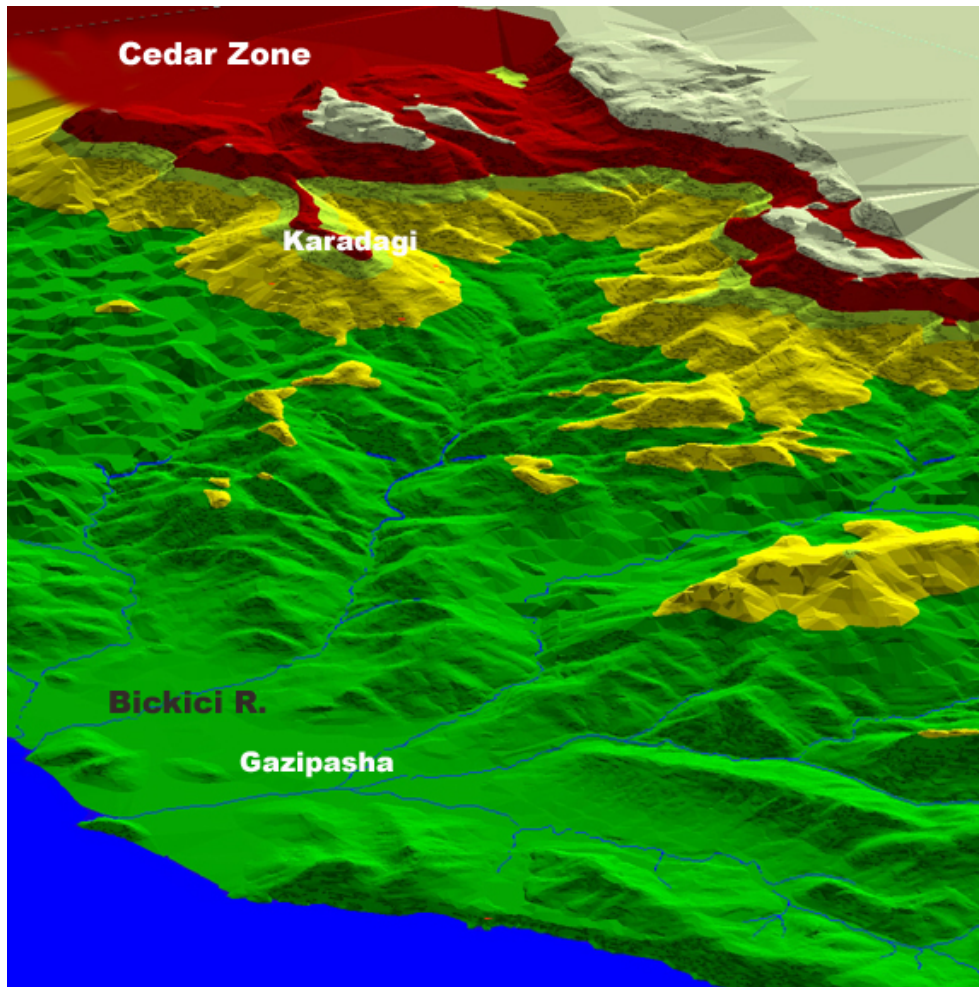


Figure 2: DEM model of the Biçkici river basin



Figure 3: View of the Biçkici river basin from the Karadağı fire tower

Pursuant to the current research agenda the team engaged this past summer in archaeological and geomorphological survey of the Biçkici River Basin. Team members explored a vast portion of the Biçkici watershed, visiting and recording six ancient sites in the upper watershed region. The team also made preliminary findings in the Kaledran watershed to the south. More than ten previously unexplored ancient and premodern cultural complexes were identified and recorded, the largest number ever in a single survey season (see figure 4). The geoarchaeological team conducted a detailed assessment of the entire course of the Biçkici catch basin. Doyle and Filley determined that alluvial deposits in the Biçkici are unlikely to furnish sufficient soil, carbon, or lignin samples to determine historical rates of erosion consequent to deforestation. However, due to the discovery of what appear to be Roman era "logging camps" in a cedar forested zone at the head of the Kaledran canyon (south of Lamos), the team plans to make a comparative assessment of the erosion profiles of Biçkici and the Kaledran basins combined. On inspection, Doyle and Rauh confirmed the presence of deep alluvial deposits of fine sediments at the mouth of the Kaledran River. As a result, the team has identified this catch basin as an additional, potentially more informative target for the research agenda of 2004.

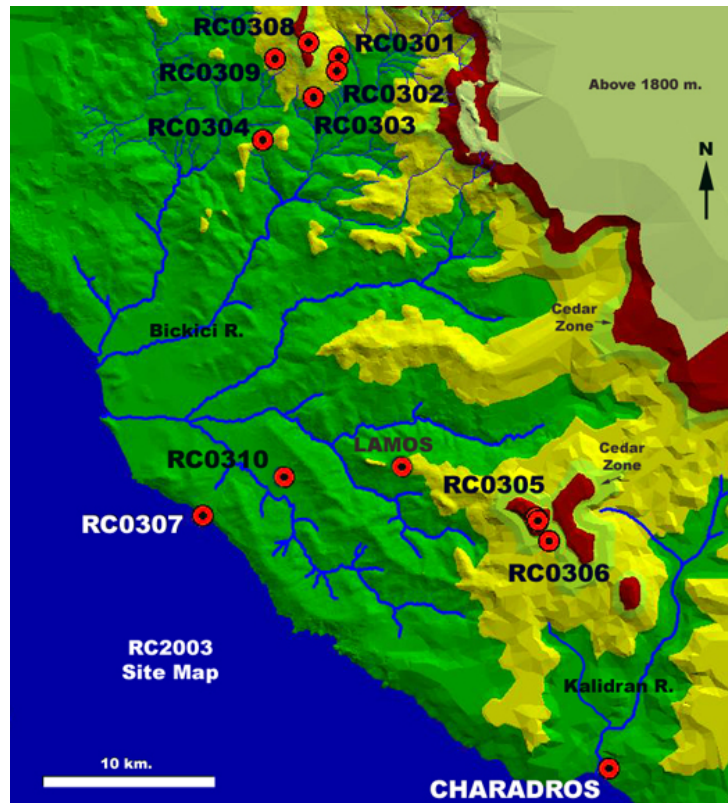


Figure 4: Sites investigated during the 2003 RCSP season

Geomorphological Assessment of the Upper Bıçkıcı River Basin

Martin Doyle (UNC-Chapel Hill) and Tim Filley (Purdue University)

The purpose of the geomorphological survey is to quantify the effects of deforestation on the magnitude, the rates, and the timing of sediment deposition in the Bıçkıcı basin, and at the same time to identify areas of deposition for palynological, charcoal, and lignin analysis. From sediment, topographic, and bathymetric data acquired along the river valley, the team is constructing hydraulic, sedimentation, and soil erosion models capable of simulating historic changes in this watershed as a result of deforestation and/or agricultural use and abandonment. Through geological core-sampling, project collaborators are obtaining microscopic samples of woody and foliar tissue residues capable of identifying archaeological woods and charcoals. Tissues residues from grasses, woody angiosperms and gymnosperms found in sediments will be differentiated using geochemical tests to distinguish among chemical forms of lignin and the stable carbon isotope composition of its chemical residues. The team also intends to obtain samples of ancient charcoal residues through magnetometer inspection, auger sampling, and ceramic collection at the Bıçkıcı kiln site. Through laboratory analysis the team will match these samples against wood from ship remains and archaeological sites in Turkey to identify the types of trees used in antiquity and their areas of origination. Along with palynological, macrobotanical, and

Carbon-14 analysis, these strategies will enable the team to obtain more precise data for the form, scale, and duration of Cilician deforestation.

The catch basin of the Biçkici can be classified according to three distinct zones (see figure 4):

1. The upper canyon of Karatepe, characterized by its highland river terrace (800 m in altitude) surrounded on three sides by the steep limestone slopes of the canyon (see figure 5). The highland terrace has been cut by Biçkici tributaries into a V-shaped headland with deep incisions on either side.
2. The second region of the Biçkici is characterized by rapidly descending foothills after river passes through a narrow gorge at the base of the highland terrace. In the second region the hills diminish in size until they even out with the coastal plain (see figures 2 and 6).
3. The third area is represented by the flat broad plain of the river as it approaches the sea north of Gazipaşa. Each segment is approximately 8 km in length (see figure 7).



Figures 5-7: the crest of the Biçkici Canyon (left); Highland river terrace at Karatepe (middle); the braided river bed of the Biçkici river basin (right)

During the 2003 survey season Drs. Doyle and Filley inspected the length of the Biçkici river basin and concluded as follows. The headwaters of the Biçkici River extend to steep mountain peaks with elevations in excess of 2000 m (see figure 5). Even the highest and steepest parts of the upper canyon had some kind of vegetation on them, most often pine trees. Landslide stability analysis shows that these areas of the watershed remain stable with vegetation in place but become unstable when vegetation is removed either totally or with stumps in place. During past eras trees conceivably covered the entire river basin and when logged triggered landslides throughout the same. Logging-triggered landslides would have been most prevalent in the upper portions of the watershed where the slopes are steepest; however, they may also have been prevalent in the middle altitudes owing to the convergence of flow.

Hill slopes throughout the basins in this area are covered with a very thin layer of topsoil perhaps only 0.5 meters thick at their greatest. Underneath this lies a very

weathered rock layer which is highly friable and unstable at high slopes. The thickness of this layer is on the order of several meters overlying bedrock outcrops. Many of the landslides that are visible on the landscape and not necessarily caused by roads are approximately 1 to 2 meters deep. Many of the smaller landslides along the roads were small to medium rotation slumps on the order of tens of meters in length and several meters deep vis-à-vis the rotational failure plane. Tension cracks form at the head of the rotational slumps but are not always visible. No rotation slumps were observed in the fields or in other areas not affected by roads. Rotation slumps do not appear indicative of the landscape stability outside of the areas of roads, therefore. They appear to have occurred only in the area disturbed by road development.

In contrast, numerous landslides/debris slides throughout the landscape are consistently located at the convergent portions of the landscapes (see figures 8-9). Water flow converges into hollows during wet periods, triggering loss of cohesion in the soil matrix which in turn induces the formation of landslides or debris slides. These tend to be very consistent in form and origin. Particularly along river axes at the head of the landslide scarp, many of the larger landslides occur at the site of an emergent spring combined with weak top soil. At these locales a person's foot will sink deeply into the sediment. Whether these instances of "perching" or emerging points of the local groundwater are the cause or the result of a landslide cannot be determined at present.



Figures 8-9: Landslides in the Biçkici headlands

Along "Tributary B" just downstream of the confluence where Doyle and Filley sampled for charcoal, an extremely large and longitudinally long landslide appears still to be active. In addition, the area containing the landslide exhibits newly planted stands of forest. The absence of trees in the landslide scarred area indicates that the

newly planted trees lack sufficient root strength to resist the force of the landslide. Whereas, tree roots appear to go down less than a meter, the depth of the landslide scar is approximately two meters.

The river channels throughout the upper watershed are filled with extremely large and very poorly sorted fluvial material. Size stands generally in the cobble to boulder range and more often straight boulder range (see figure 9). Some rounding of the sediment indicates that the material is being transported at least some distance; however, the absence of sorting or arrangement of the material within the channel indicates that it is far from alluvial. Within the upper watershed, the channels are tightly coupled to the adjacent hill slopes; no storage or buffering of hill slope material occurs on a floodplain or other adjacent surface before it reaches the channel. That is, the material eroded from the hill slopes fails to present itself directly in the channel. It is fair to assume that the situation would have been similar 2000 years ago. Hill slope derived materials eroded by logging would have been conveyed directly into channels, which in turn were presumably competent to move all but the largest fraction of this material (see figure 10).



Figures 10-11: Logging depot on the Biçkici road (left); washed out bridge in the upper Biçkici Canyon near Şahinler village (right)

Given the relative confinement of the channels within the valleys, they presumably exhibit extremely high stream power during flood events. In fact, during late Spring 2003 Rauh noted during a brief visit to the upper watershed that flooding had completely destroyed a small concrete bridge at the head of the canyon (see figure 11). The absence of any finer alluvium in the lower course of the river bed indicates that the force of the flood waters is sufficient to transport all material finer than large gravel or even cobble to the Gazipaşa basin below. Accordingly, there is extremely limited storage of fluvial material within the upper watershed, making it difficult to locate material from which to extract organic material for dating or biogeochemical analysis.

Preliminary assessment indicates, therefore, that alluvial deposits in the Biçkici are inadequate to provide the data necessary to evaluate historical rates of erosion. For

this reason the survey team is turning its attention to the Kaledran canyon, for reasons to be mentioned below. It is hoped that comparative analysis of alluvial deposits in both catch basins will furnish important insight on the geomorphological development of the region and likely impact of historical land use and resource utilization.

Archaeological Survey

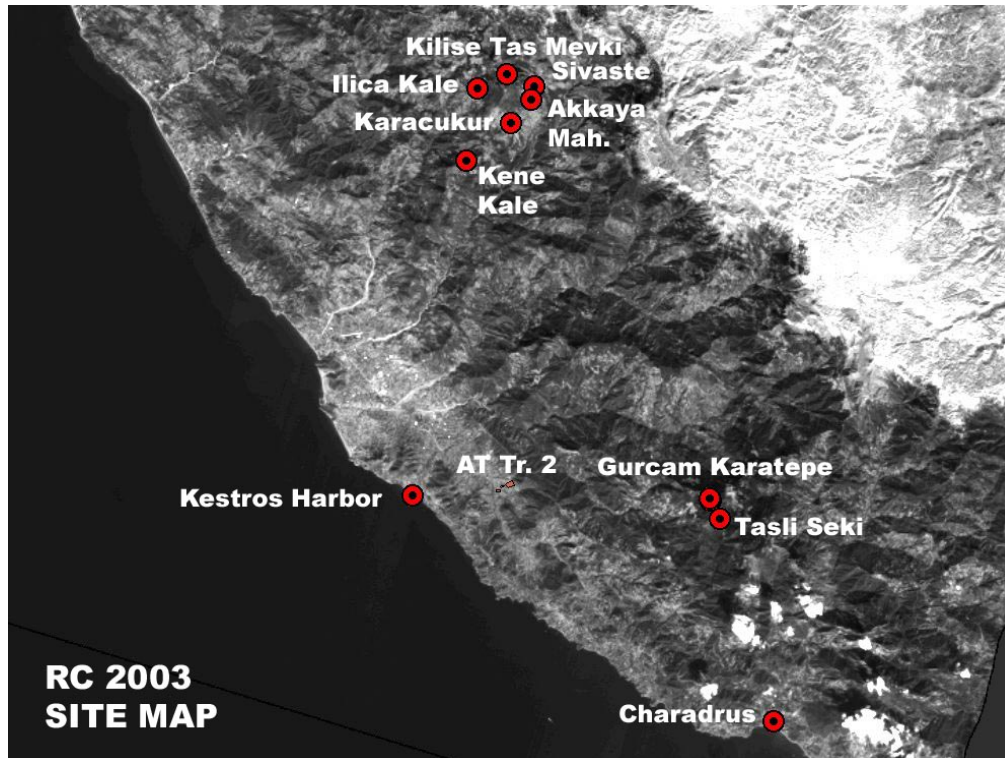


Figure 12: Satellite view of the 2003 RCSP work areas

Part One: The Biçkici Watershed

The archaeological survey team devoted approximately 10 field days to the exploration of the upper watershed area above the highland terrace of the Biçkici and its modern village of Karatepe (see figure 12). On the west side of the terrace the mountain of Karatepe rises somewhat less steeply from the foothill region through a series of benches, lesser peaks and saddles until it joins with the crest of the Tauros plateau. The northern and eastern sides of the canyon, on the other hand, rise very steeply to form a nearly vertical wall. Discovery of some six architectural sites and a possible network of Roman roads on the western slope of the canyon indicates that premodern inhabitants used the more accessible western rise of Karatepe as the main route from the coast to the inhabited regions of the plateau beyond.

Previous investigation of the Biçkici watershed area by Bean and Mitford in 1961 led the project director, Nick Rauh, to assume that few significant sites existed at the

upper reach of the canyon. Like Heberdey and Wilhelm (1896) before them, Bean and Mitford recorded the presence of an inscribed exedra at Sivaste (RC 0301), but they otherwise dismissed the site as insignificant (see figures 13 and 14).



Figures 13-14: View of the acropolis of RC 0301, Sivaste (left); Remains of an inscribed exedra at RC0301 Sivaste (right)

Likewise, they refer to Gevinde (which, based on their description, is identical with RC 0309, Ilica Kale) as a "a small ancient site, hardly amounting to a city, with ruined buildings of late date still standing to a considerable height" (Bean and Mitford 1965: 30). The Rough Cilicia Survey Team was fortunate to meet with police authorities in Karatepe who were extremely knowledgeable about the state and location of ancient remains in the vicinity and willing to direct the team to their approximate locations. As a result the team immediately on arrival learned the locations of seven sites in the canyon area. In the time available the team was able to confirm the existence of six of these sites, all situated along the more accessible (western) slopes of Karatepe Mt. In the time available the team was unable to visit a seventh site situated on an inaccessible outcrop on the steep eastern wall of the canyon. Photographs of on-going looting of the site, shown to the team by police authorities, indicates that this site, along with RC 0301, RC 0304, and RC 0309, was large and urban, exhibiting monumental features.

The presence of so many sites, and so many noteworthy sites, in the watershed area posed a significant challenge to the work program of the 2003 season. The team decided to devote the available time to systematic investigation of the sites in question in order to establish the temporal limits of the region's development during antiquity. Even this decision proved highly ambitious. At Sites RC 0301, RC 0302, RC 0303, and RC 0304, the team conducted intensive, systematic analysis of all visible architectural elements and surface pottery, according to the procedures used in past seasons of the survey. Site RC 0304 proved to be so large, however, that the team had little choice but to select the most advantageous area of the acropolis (Kömürlük Tepe) for systematic ceramic processing and analysis.

The team identified and processed more than 230 sherds across approximately 40% of the area of the acropolis on Kenetepe (see figure 15). In addition to the remaining terrain of the acropolis, the terraced fields of Yalman Tepe, the peak opposite the acropolis, as well as the area of the "necropolis" in the saddle between exhibited ceramic surface remains. Full processing of the available ceramic data would have required several more days than were available. Nevertheless, the team believes that the ceramic data from the acropolis sufficiently identifies the temporal limits of the settlement. Late in the season the team managed to return to Karatepe to inspect the remaining two sites on the west slope of the canyon, RC 0308 (Kilise Taş Mevki) and RC 0309 (Ilica Kale). The fact needs to be stressed that the time required to journey to these two relatively inaccessible sites reduced the team's analysis to a minimal prospection. All significant architectural elements were measured, photographed and recorded, but ceramic analyses were restricted to a preliminary sampling deemed sufficient to form a minimal assessment of the temporal limits of each site.

The team's conclusion regarding the upper Biçkici Basin is that the region exhibited far greater urban development during antiquity than indicated by previous visitors. Three significant urban sites displaying abundant monumental architecture (RC 0301, RC 0304, and RC 0309) existed on the west slope of the canyon. Evidence of a network of Roman roads identified at RC 0302 (Akkaya Mahallesi) that appear to converge in the direction of Site RC 0301 Sivaste indicates that these urban complexes were carefully integrated with each other as well as with the communities on the coast (see figure 16).



Figures 15-16: Site RC 0304, Kenetepe, viewed from the north (left); Remains of Roman road at RC 0302, Akkaya Mahalle

One of the urban sites, RC 0304, Kenetepe, qualifies as an extremely large site, perhaps as large in area as the site of Asar Tepe in the Hasdere Canyon. In addition to a significant extent of wall fall on the acropolis (see figure 17), the site displays a necropolis in the saddle below the acropolis. Here the team recorded some sixteen *larnaces*, or "cinerary coffins," several bearing inscriptions. A few meters away the team encountered a 5-meter tall rock cut narrative relief, employing recognized

Isaurian motifs (Er Scarborough 1991, 1998). On a dressed “pilaster” surmounted by an eagle and a military figure at the left of the relief, team members could discern the faint lettering of a Greek inscription of 23 lines. Despite making a squeeze of the block, the lettering was too worn to yield a text. Nonetheless, the scale and detail of the relief at Kenetepe is unprecedented for this region (see figure 18). Further investigation revealed evidence of structural remains on Yalman Tepe opposite the acropolis. Much like the acropolis on Kömürlük Tepe, heavy vegetation and widespread wall fall limited our ability to identify any significant features.



Figures 17-18: Remains of a possible temple tomb on the Kömürlük Tepe acropolis at Kenetepe (RC 0304, left); Remains of a rock-cut relief on the acropolis



Figures 19-20: Remains of a *larnax* with equestrian relief in the necropolis at Kenetepe (RC 0304, left); An inscribed altar in the necropolis (right)

Team members identified the foundation of at least one temple-tomb structure, one press complex, and several blocks bearing reliefs. An urban center of this stature must surely have borne a name; however, team members have not had sufficient time to explore the available textual evidence of regional site names.



Figure 17: Isaurian-style, rock-cut narrative relief with inscribed pilaster at RC 0304, Kenetepe (photograph by Art Krispin)

Turning to Site RC 0301, Sivaste (see figure 18), the team found the inscribed exedra previously described by Heberdey, Wilhelm, Bean, and Mitford, severely damaged by looters (see figure 14 and 19). However the site exhibited several larnaces with figural reliefs (see figure 20) as well as structural remains, including a rectangular structure with a stylobate.



Figures 19-20: View of the “acropolis” at Sivaste, Site RC 0301 (left); remains of the inscribed exedra recorded at Sivaste (right)



Figures 21-22: Larnax bearing “shepherd’s relief” at Sivaste, RC 0301 (left); fragment of lintel block with “cross’ graffito (right)

Beside this stand the remains of a circular or semicircular structure that functioned either as an adjoining apse or as an unattached exedra; the feature is currently too damaged and covered by recent agricultural terracing for the team to form a better assessment. On the face of a dressed stone fragment at the rectangular structure survive Christian graffiti (a cross etched in a circle) (see figure 22). Across the road and directly above the site structural and ceramic remains ascend the slope for a considerable distance.

High above Sivaste on an isolated rock outcrop just below the summit of Karadağı sits a small fortified site, RC 0308 Kilise Taş Mevki, which given its location, represents a potential highland boundary to the territorial reach of Sivaste (see figures 23-24). The inscription recorded on the exedra at Sivaste (see above, figure 20) by Heberdey and Wilhelm and confirmed by Bean and Mitford records the existence of a "polis," that is, a legally recognized municipality (Heberdey and Wilhelm 1896: 132, no. 218).



Figures 23-24: View of site RC 0308, Kilise Taş Mevki (left); remains of Late Roman fortification wall at site RC 0308 (right)

Site RC 0309, Gevinde, or Ilica Kale, presents itself preliminarily as a Late Roman/Byzantine church site (see figure 25). Its remains include a large rectangular fortified precinct defended by a strong wall standing circa 5 m tall and a meter thick, and a complex of apparently Christian structures on a neighboring hill (see figure 26). These include a small cross-shaped **CHURCH** with apses on at least three of its sides, much like the lost Triconchus church at Antiochia ad Cragum (Rosenbaum et al. 1967: 45; see figure 27). In a neighboring, large, rectangular structure the team found remains of a fine figural mosaic (see figure 28). Evidence of Early Roman isodomic-block construction survives amid remodeled Late Roman remains (see figure 29). Numerous figural reliefs, some inscribed, are visible in the fields below the structural complexes; however, the team lacked sufficient time to determine the spatial limits of the site (see figure 30).



Figures 25-26: View site RC 0309, Ilica Kale or Gevinde (left); Remains of fortifications at RC 0309 (right)



Figures 27-28: Remains of apse at RC 0309 (left); Remains of figural mosaic (right)



Figures 29-30: Construction employing isodomic masonry at site RC 0309, Ilica Kale (left); Inscribed larnax with figural relief at site RC 0309 (right)

All three urban sites (Sivaste, Kenetepe, and Ilica Kale) exhibit strong evidence of architectural monumentality, inscribed literacy, and importation of transport amphoras and ceramic finewares from abroad. More significantly, pottery analysis at each site demonstrates that habitation in this region spanned the same premodern phases as those of the large urban sites along the coast. The team identified a significant quantity of Hellenistic fineware at R0304 Kenetepe, and at least a minimum of the same at RC 0301 Sivaste and RC 0309 Ilica Kale. All three sites exhibit abundant Early Roman finewares (predominantly Cypriot Sigillata, but some ESA as well), and all three exhibited significant quantities of Late Roman finewares (Cypriot Red Slip, Phocaeen Ware), more so, in fact, than was generally encountered at the urban sites of the Hasdere Canyon during the 2000-2002 seasons. The team also recorded samples of Byzantine fineware at RC 0304 Kenetepe and RC 0309 Ilica Kale.

In short, the ceramic data for the surface pottery of the urban sites of the Biçkici watershed forms a relatively unbroken sequence from Hellenistic times through the Late Roman/Byzantine era and appears more closely to resemble those of the coastal region. In contrast, the pottery data of the Hasdere Canyon tended to display a sharp decline in ceramic totals for the Late Roman/Byzantine periods. Precisely how early the highland region of the Biçkici watershed became inhabited is indicated by the ceramic finds of RC 0303 Karaçukur, to be discussed immediately below (see figure 31).



Figures 31-32: View of RC 0303, Karaçukur (left); Remains of primitive wall at RC 0303 (right).

In terrace fields at the base of a pronounced rock outcrop rising directly above modern Karatepe village, the team found wall remains constructed from rough hewn blocks (see figures 31-32). Although heavily reworked over time, a few segments of the lowest course of the wall appear to rest in situ. In the fields beside the walls, a significant quantity of pre-Roman pottery was systematically identified and recorded. Remains include an obsidian blade, lithic debitage, several fragments of hand-turned pottery, rims of three Classical-era bowls with interior thickened rims and offset walls, and a few Hellenistic incurved rim bowls and amphora handles (see figures 33-35).



Figures 33-35: An obsidian blade from RC 0303, Karaçukur (left); Fragment of a hand-turned cookpot (middle); Rims of Classical fineware bowls (right)

The most impressive find was the largely intact fragments of a piriform jug with flat base and hand-made strainer spout (see figure 36). The remains of an off-center ledge handle are also visible. Although the team was unable to establish its date, though similar forms at Corinth and the Athenian Agora are assigned to the Classical/Hellenistic Eras (Stilwell et al. 1984: 2203, 2207, 2213; Rotroff 1997: 1183-1189). The meager remains of RC 0303 Karaçukur appear to indicate that habitation of the Biçkici occurred during the pre-Classical Era (obsidian blade and other lithic fragments). If so, Site RC 0303 furnishes the earliest identified site in the survey region to date.



Figure 36: Piriform strainer jug from RC 0303, Karaçukur

Part Two: The Kaledran Watershed

At the beginning of August survey operations relocated to the Hasdere Canyon in order to complete architectural mapping at Asar Tepe and Lamos. While the architectural team completed its plans, the pedestrian team experimented with the investigation of several previously unwalked land parcels. Transects walked in the vicinity of Asar Tepe revealed an isolated Late Roman/Byzantine structure (possibly a farmhouse) in the plain facing the coastal highway below the site (RC 0310, Asar Tepe Transect 2, see figure 37).



Figure 37: View of survey unit RC 0310, Byzantine farmhouse, in the Beyrebucak river valley

The pedestrian team then directed its attention to a previously uninvestigated mountain peak at the crest of the same ridge as Lamos. The Bozkaya-Lamos ridge rises northeastward to the peak of Gurcam Karatepe (circa 1690 m in altitude, see figure 38). Team members ascended the road to Gurcam Karatepe as far as vehicles would allow and exited to find themselves above 1400 m. in the midst of a mixed conifer forest of cedar, fir, and juniper trees. The team georeferenced and measured the circumference of at least five large cedar trees, the largest measuring 5.2 m at the base (see figure 39). This mountain marks the closest habitat to the coast (approximately 15 km) where cedar trees are present.



Figures 38-39: The peak of RC 0305, Gurcam Karatepe (left); team members measuring the circumference of a large cedar tree at Gurcam Karatepe (right)

At the crest of Gurcam Karatepe sits a modern fire tower (see figure 40). In the immediate vicinity of the fire tower, team members encountered Roman surface remains.



Figures 40-42: Modern fire tower at RC 0305, Gurcam Karatepe (left); Remains of Roman era structures at site RC 0305 (middle); Fragments of ESA fineware processed at site RC 0305 (right)

Systematic survey of the site revealed the ruins of at least two small rectangular structures and an ample number of extremely weathered ceramics, minimally identifiable as Early Roman ESA fineware (see figures 41-42). The high altitude of the remains (circa 1650 m) combined with the barren terrain of the peak would seem to exclude the possibility of all but forestry-related activities during past eras. The presence of these remains situated directly above a surviving stand cedar trees (cedar now being protected by Turkish law) indicates the existence of ancient logging enterprises directly above the settlement of Lamos, the walls of which are visible from the site.

Forestry Ministry employees at the fire tower directed the team's attention to a second site, situated approximately 1.5 km. away, on a bench below the road at c.

1350 m. in altitude (RC 0306 Taşlı Seki). Systematic survey of Taşlı Seki revealed more abundant, though equally weathered ceramics and a small acropolis harboring some 10 to 15 structures. The team identified evidence of a defensive wall as well as a large doorsill to a monumental structure. Identifiable pottery remains indicate habitation as early as the Hellenistic era (black slipped fineware), but predominantly during the Early Roman era (see figure 43).



Figure 43: Structural remains at Taşlı Seki, RC 0306

The site of RC 0306 Taşlı Seki is sheltered to the north by the saddle of the ridge as it extends from Gurcam Karatepe to a neighboring peak topped by a modern village. The saddle and the bench sustaining RC 0306 Taşlı Seki form the crest of the Karasin branch of the Kaledran Canyon (the ancient Charadros or "Cataracts Canyon"), a narrow gorge with rugged flanks that winds southeastward some 15 km. to the coast (see figure 44).

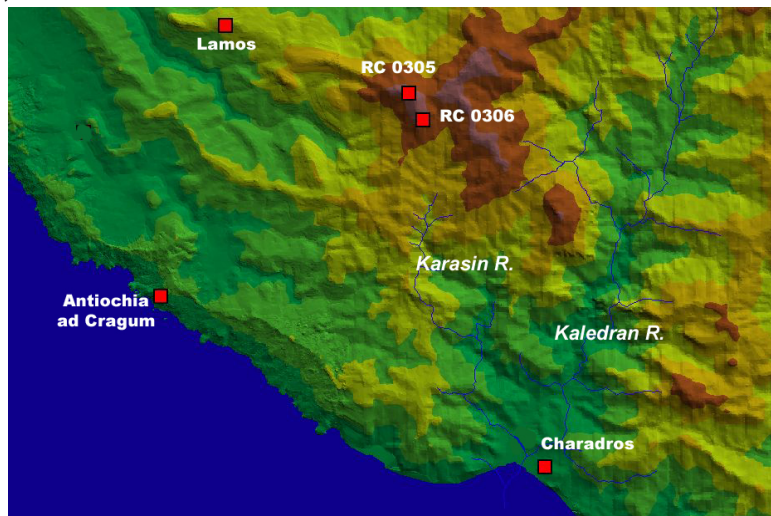


Figure 44: Sites along the Karasin - Kaledran river basin

The presence of cedar trees and logging camp remains at the crest of the canyon induced members of the team to visit the mouth of the canyon via the coast highway.

At the base of the canyon the team found a narrow basin exhibiting at least three river terraces bearing fine-grained alluvial sediments. Above the mouth of the canyon sits a small hill harboring the remains of the ancient roadstead of Charadros, an ancient settlement mentioned by Strabo and other sources. In the fields beside the river, perhaps a kilometer from the beach, a two-storey structure, identified by Scott Redford (2000) as a Seljuk hunting pavilion (see figure 45) still preserves its terracotta roof tiles. One wall exposed to the force of the river has collapsed due to excessive erosion.



Figure 45: A two-story Seljuk hunting pavilion near Charadros

Investigation of epigraphical data reveals that during the reign of the Roman Emperor Septimius Severus (bet. 199-210 AD) Charadros functioned and was officially recognized as the harbor or anchorage (*epineion*) of the Lamotis, that is, the territorial hinterland of Lamos (Cagnat 1906-11: 3.838; Jones 1971: 211). The accumulation of so many converging strands of information -- the presence of cedar trees and Roman logging camps on the intervening peak between Lamos the Kaledran canyon and the record that Charadros, situated at the mouth of the Kaledran canyon, served as the harbor of Lamos -- indicates that an significant degree of imported and locally produced resources circulated along this river system. Imported goods and services possibly made their way to Lamos via the Karasin branch of the canyon while locally exploited resources such as timber, forestry supplies (tar, pitch, resins), raisin wine, and honey, made their way to the coast.

Plans for the 2004 Season

Team members concluded, therefore, that the cache basin of the Kaledran River offers greater likelihood of success for the application of combined methodologies of archaeological, geomorphological, and maritime survey than the Biçkici. The survey program of the 2004 season has been adapted accordingly. Preliminary plans for the 2004 geoarchaeological survey call for geological mapping of the western branch of the Kaledran Canyon and limited, systematic core sampling and back-hoe trench sampling in both the Biçkici and the Kaledran canyons. Attempts will be made to obtain macrobotanical, carbon, and woody tissues samples from both watersheds for purposes of comparative analysis. The maritime survey will conduct bathymetric survey of outlets of the Biçkici and the Kaledran Rivers. It will also explore areas such as the "Kestros Cove," Nephelion, Antiochia ad Cragum, and Charadros for evidence of submerged maritime installations. During the 2003 season the pedestrian team briefly explored a bluff overlooking a small relatively protected sea cove situated below the site of Kestros (RC 0307) (see figure 46). Amid cultivated terraces of banana trees the team found worked blocks of marble together with a large deposit of Late Roman fine ware and amphora remains (see figures 47-49). An inscription discovered at Kestros by Bean and Mitford in 1968 and making mention of a harbor official (*limenarche*) confirms the existence of a harbor somewhere in the vicinity (Bean and Mitford 1970: 166, no. 176). The cove in question offers itself, therefore, as a likely target for marine exploration by the maritime survey team. A brief catalogue of the sites investigated during the 2003 survey season is presented below.



Figures 46-47: Satellite view of the site of Kestros cove (RC 0307) (left); View of remains at site RC 0307 (right)



Figures 48-49: A fragment of stamped African Red Slip ware from site RC 0307, Kestros cove (left); Rim and handle attachment of a LR 1 Yassi Ada amphora from site RC 0307 (right)

Rough Cilicia Archaeological Survey, 2003 Season: Catalogue of Sites

Rc 0301 Sivaste (above modern Karatepe village; also called Kaynarca Mahallesi on the military map) visited by Heberdey and Wilhelm (1896: 131, no. 218) before 1986 and Bean and Mitford (1865: 29) in 1962. Pottery remains appear to run the entire sequence from late Hellenistic to Byzantine. Featural remains include several funerary reliefs, a large inscribed exedra, and another building with inscribed Christian graffiti on the stylobate blocks. The remains appear to be those of an acropolis monumental area. Above the site rest additional remains.

RC 0302 Akkaya Mahallesi. Near there we found a network of rock-cut Roman roads below the school house. At least two roads appear to converge in the direction of Sivaste. Stretches of the road show unmistakable evidence of Roman road construction, broad level cutting in the base rock filled with large stone chips. Today, the road intersects with a modern aqueduct conveying rushing spring water to the school and nearby farms. The locals placed a large olive crushing wheel by the aqueduct to use as an outdoor table. They claimed to have removed the wheel from nearby Sivaste.

RC 0303 Karaçukur, also called Asar Tepe on the military map. At the base of a butte directly above the *jandarma* base and the village we found prehistoric remains - several pieces of handmade pottery, an obsidian blade, and some sort of strainer pot (beer pitcher, etc) the date for which remains uncertain. Although the form is wheel turned, the strainer spout is hand fashioned. Walls constructed from rough cut irregular stone blocks appear to be modern features, though one stretch of wall displays possibly original stonework along its lower courses. Ceramic remains include

off-set wall Classical bowls and Hellenistic incurved rim bowls. None of the pottery at this site appears to date later than the Hellenistic Era.

RC 0304 Kenetepe (Kene Tepe is actually the name for the entire ridge; more specifically, the site straddles Kömürlük Tepe and Yalman Tepe). To the southwest of the village, high on a cliff-faced butte the team found the remains of a large settlement, perhaps 50-60 structures, including s temple-like tombs. On the acropolis the team processed 220 sherds in 2 days over roughly 40% of the remains. The pottery extends from Hellenistic to Byzantine eras and includes some small obsidian worked fragments. In a saddle below the acropolis the team found an Isaurian military narrative relief and a necropolis with three reliefs bearing inscriptions. Preliminary textual readings yielded nothing to reveal the name of the site, which was never seen apparently by Bean and Mitford. The place is arguably as large as Asar Tepe and in some ways similar, but the wall fall is so extensive and deep that it is difficult to identify any significant architectural remains.

RC 0305 Gurcam Karatepe

On a mountain at the head of the ridge where Lamos is situated the team discovered a rare surviving cedar forest of more than 50 trees, one actually 5.2 m. in circumference. Numerous junipers and firs were also present. A fire tower sits at the crest of the mountain at 1690 m. Directly behind the fire tower the team found some very meager Roman structural remains and pottery.

RC 0306 Taşlı Seki

On a bench below the crest of the mountain but situated at the head of the Kaledran Canyon at approximately 1350 m., the team found a second, larger Roman settlement. Pottery at this site indicates Hellenistic and Early Roman phases. On a small rise structural remains for some 10-15 structures are visible, among which a possible defensive wall and a doorsill to a monumental structure.

RC 0307 Kestros Harbor?

While the architects attempted to map the urban coastal site of Kestros for the final technical report, part of the walking team explored the bluff overlooking a small relatively protected cove on the shore below the site. Amid cultivated terraces of banana tree above the coast the team found worked blocks of marble reused in the terrace walls, together with a large deposit of Late Roman (Cypriot Red Slip) fine ware and (Yassi Ada LR 1) amphora remains. With their discovery of a Kestrian inscription making mention of a harbor official (*limenarche*), Bean and Mitford demonstrated the likely presence of a harbor for the site (Bean and Mitford 1970: 166, no. 176). The cove in question now offers itself as a likely target for underwater investigation by the maritime survey team in 2004.

RC 0308 Kilise Taş Mevki. Set back just below the crest of Karatepe Mt., about a kilometer from the fire tower stand the remains of a small fortified outcrop (c. 1400

m.) that look directly down on the butte of Sivaste (RC 0301). Meager pottery remains indicate Roman-era occupation; however, the site's defensive wall looks later. A single stretch of defensive wall, approximately 10 m. in length, appears to buttress the natural strength of the outcrop. The wall construction employs small square blocks set in mortar and is more than a meter thick.

RC 0309 Ilica Kale

Lower down on the other side of Karatepe ridge facing west above the Delice River basin sit the remains of a Late Roman/Byzantine church complex, the remains of which include a well preserved figural mosaic. Based on Bean & Mitford's limited description, this site appears to be the same as their Gevinde (Bean and Mitford 1965: 30). On a bluff above the church complex stands a large, rectangular fortified area that is distinctly visible on the satellite image. Its circuit wall is some 4 m. tall and 1 m. thick. The wall employs mortared smooth courses on its exterior faces and rubble and small block fill. The church complex consists of several structures of different chronological phases. The mosaic floor rests in a relatively well preserved rectangular building. Employing white, black, and brown *tesserae*, well designed figures of a deer and a table amphora are clearly visible in the exposed section of the mosaic. A poorly worked Doric capital and an inscribed block were also found there. Beside this lie the remains of a small church structure, the corners of which are formed by three or four apses, thus, similar in design to the "Triconchus" church at Antiochia ad Cragum. On the south side a small rounded recessed area built into the wall resembles a baptistery. Remains of wall fresco on this side display animal figures. Directly east of the church stand remains of later construction that incorporate blocks from earlier phases of construction. One wall segment survives in situ in the form of large, finished, well-set, isodomic blocks. Together with the discovery of one black slipped and several Early Roman fineware sherds, this feature demonstrates a Late Hellenistic or early Roman phase to the site. Time constraints permitted a very cursory examination of the surface pottery. This appeared to range from a Hellenistic black-slipped fineware sherd to a Byzantine green glazed sherd found in the baptistery.

RC 0310 Asar Tepe Transect 2

As the architectural team completed the plan of Asar Tepe, the pedestrian team walked two transects in the immediate vicinity -- one along the ridge-top road below the site, heading northwest in the direction of Gazipasha, the other in the fields at the base of the ridge, directly below the cliffs of Asar Tepe in the direction of the coast highway. Walking toward the highway, the team found three meager pockets of ceramic remains along a dirt road in the first transect (AT transect 1). In transect 2 the team found several sherd scatters as well as structural remains of a house or farm, including a fashioned doorsill. The ceramics were exclusively Late Roman and Byzantine and included Sgraffito white ware sherds.

References

Bean and Mitford 1962

Bean, G. E. and T. B. Mitford, Sites Old and New in Rough Cilicia. *Anatolian Studies* 12:185-217.

Bean and Mitford 1965

Bean, G. E. and T. B. Mitford, *Journeys in Rough Cilicia in 1962 and 1963*. Austrian Academy of Science, Vienna.

Bean and Mitford 1970

Bean, G. E. and T. B. Mitford, *Journeys in Rough Cilicia 1964-1968*. Austrian Academy of Science, Vienna.

Cagnat 1905-1911

Cagnat, R., *Inscriptiones Graecae ad res Romanas pertinentes*. Vol. 3, Paris, E. Leroux.

Er Scarborough 1991

Y. Er Scarborough, Diversità e interazione culturale in Cilicia Tracheia. I monumenti finerari, *Quaderni Storici* 76: 105-140

Er Scarborough 1998

Y. Er Scarborough, Dağlık Kilikya-Lamotis Mezarları, *Olba* 1: 77-85

Heberdey and Wilhelm 1896

Heberdey, Rudolf and Adolf Wilhelm, Reisen in Kilikien, *Denkschriften des kaiserlichen Akademie der Wissenschaften*, (Vienna, Gerold) 44: 1-169.

Jones 1972

Jones, A.H.M., *Cities of the Eastern Roman Provinces* (2nd Ed.). Oxford University Press, Oxford

Redford 2000

S. Redford, *Landscape and the State in Medieval Anatolia. Seljuk Gardens and Pavilions of Alanya, Turkey*, BAR International Series 893, Oxford

Rosenbaum et al. 1967

Rosenbaum, E., G. Huber, and S. Onurkan, *A Survey of Coastal Cities in Western Cilicia*. Preliminary Report. Monographs of Turkish Historical Society VI/8, Ankara.

Rotroff 1997

Rotroff, Susan, *The Athenian Agora, Vol. 29: Hellenistic pottery: Athenian and imported wheelmade table ware and related material*. Princeton U., American School of Classical Studies in Athens.

Stillwell et al. 1984

Stillwell A.N., J.L. Benson, et al., *Corinth Vol. 15 pt.3. The potters' quarter: the pottery*. Princeton, N.J.: American School of Classical Studies at Athens