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Towards an Archaeology of Place

edited by

Ömür Harmanşah


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In our everyday lives, we distinguish natural and cultural features of the landscape, where mountains belong to the natural world and buildings to the cultural one. Many groups in the past, however, did not envision their world in this dichotomous manner, but viewed it as a single entity. If people of the past did not dichotomize their world, neither should we. This is where landscape archaeology comes in, because it assesses the social relationships between people and the world in which they lived (Anschuetz et al. 2001), and stresses the multivocal aspects of landscapes through space and time (Bender 2002). This method is not about determining what people did to the landscape, but rather what they did with the landscape. In this sense, “Culture is the agent, the natural area is the medium, the cultural landscape is the result” (Carl Sauer, quoted in Anschuetz et al. 2001: 164). These relationships are dynamic and may not appear in the archaeological record as what one traditionally defines as a site. In other words, our imposition of archaeological terms does not necessarily reflect the “place” as it was in the past. We therefore must redirect our focus to place rather than site (cf. Bradley 2000: 147). After all, “the landscape is full of history, legend, knowledge, and power” (Anschuetz et al. 2001: 178).

The ancient landscape is imbued with sacred qualities. In some instances, people did not augment sacred places, but instead revered them in their natural state. For the Maya, the concept of sacred landscape is even reflected in their speech. For example, the Maya use the same term for mountain and temple – witz (Stuart 1987; Stuart and Houston 1994: 82). While they did not distinguish between culture and nature, they did distinguish between the upperworld, earth, and the underworld. The earth provided the contact point between the other realms (e.g., Bradley 2000: 13, 29), each reached by openings in the earth. For mountains, portals to the underworld or Xibalba...
consist of caves and standing bodies of water; for temples, they consist of doorways often decorated with cave imagery (Bassie-Sweet 1996).

The Classic Maya (A.D. 250–950) of southeastern Mexico, Belize, Guatemala, and the western parts of El Salvador and Honduras, lived in a tropical world that shaped their entire existence. Water was crucial in this rainfall-dependent society, given that the annual six-month dry season includes a four-month period when it did not rain at all (Scarborough 2003). At well-known Classic Maya centers such as Tikal, Calakmul, Caracol, and others, the Maya relied on massive artificial reservoirs to see them through the annual drought (Scarborough 2003). Water was plentiful during the six-month rainy season when farmers worked in their fields and where daily rain showers replenished water supplies and nourished growing plants. This setting, where agricultural land and water were critical for survival, makes areas with these resources in abundance particularly attractive to settle and farm, and archaeologists find noticeable settlement in such areas (Ford 1986, 1991). Areas that defy this common trend beg the question of what human necessities were more important than water and farming.

Cara Blanca in central Belize (Figure 2.1) is such a place, where agricultural land and abundant water sources are paired with only a moderate amount of settlement (Kinkella 2000, 2004, 2009). Rationally, especially given the annual drought, we should find evidence for dense settlement; but we do not. Did its sacred or supernatural qualities trump farming and water needs enough to prevent habitation and human interference? In this paper, we approach Cara Blanca as the Maya may have done, in order to explain how its 25 freshwater pools (cenotes) and lakes and steep escarpments intertwine with their worldview.

Unlike the typical situation at major centers, the Maya at Cara Blanca did not have to build artificial mountains (temples) or portals (reservoirs, temple entrances). The few structures and features found near pools, which appear to be ceremonial, suggest its sacred role. As a matter of fact, the limited construction may have increased its symbolic significance (cf. Bradley 2000: 107). Presented below are the results of several seasons of survey and test excavations that we explain through a sacred lens. We attempt to show that the Maya journeyed to Cara Blanca as a place of pilgrimage.

The Animated Landscape in Classic Maya Society

Any undertaking in understanding the ancient Maya must take into account what they faced living in the subtropics, a region with variously sized pockets of dispersed agricultural land and noticeable seasonal differences – namely, a six-month dry season and six-month rainy season. Average rainfall, depending
on the area, can range from 1350 to 3700 mm. To provide a sense of how important water is, one only has to take into account the fact that people can lose up to 10 liters per day through sweating, and as a consequence need to drink more water than their counterparts in temperate zones (Bacus and Lucero 1999). In addition to drinking water, the Maya depended on rainfall to grow maize, beans, squash, cacao, chili peppers, tobacco, pineapple, and
so on. They lived in farmsteads dotted throughout the landscape near and in between centers, and basically were self-sufficient at the community level—in the rainy and agricultural season, anyway. Maya farmers relied on scattered and small-scale subsistence systems because of the dispersed nature of agricultural land and variable rainfall (Lucero 2006c). Thus, the highest settlement density and most powerful Maya centers are found in areas with the largest plots of prime agricultural land. Interestingly, these centers, including Tikal, Calakmul, Caracol, and Naranjo, emerged in areas that lacked permanent water sources such as lakes and rivers, which actually provided the means for rulers to acquire power (Lucero in press).

There are hundreds of civic-ceremonial centers with royal courts that had varying degrees of power. The most powerful Classic Maya kings in the southern lowlands emerged in areas with plentiful fertile land and pronounced seasonal variability (Lucero 1999b, 2002, 2003, 2006c). Rulers attracted and integrated farmers through sponsoring large-scale ceremonies, feasts, and ballgames (Ford 1996; Scarborough 1998). They drew people to centers by providing access to reservoirs during the dry season (the agricultural downtime) when many Maya had few options but to acquiesce to tribute demands for access to drinking water. The common farmer looked to kings to supplicate the gods to supply rain at the right time, since when the rains began and how much rain there was were critical factors in the agricultural regimen (Gunn et al. 2002; Lucero 2007; Marcus 2006). Centers located near rivers with smaller pockets of fertile land (i.e., fewer subjects or farmers) were not as powerful, because rulers did not have the means (reservoirs) to beholden others like those found at powerful centers.

Seasonal rainfall vagaries required continual supplications to the gods. The iconographic, hieroglyphic, and archaeological records leave little doubt of this fact. People prayed to ancestors, rain and maize gods, and other important deities at agricultural fields, near water sources and in public plazas, caves, and the home, as found among contemporary Maya groups (e.g., Vogt 1970, 1998). However, it was in the home where the material remains of their vibrant ritual life are most apparent. Domestic rites revolved around life, death, and renewal. Everything was cyclical, from the daily emergence and disappearance of the sun to their own cycle of life and death. Death was not the end of life so much as providing the stage for the beginning of life. Some contemporary Maya peoples even identify children or grandchildren as kexol, or “replacements” (Schele and Miller 1986: 266), signifying a connection between the living and the dead.

At present, we know the Maya conduct funerary rites in the creation of ancestors, which involve keeping a family member’s remains close, by burying the deceased and grave goods under house floors (e.g., Vogt 1970). They
perform dedication ceremonies to animate new houses and other objects; for the former, practices include the caching of objects under floors (e.g., Vogt 1993). Part of the renewal ceremony consists of terminating the old, for the New Year, for example, or after the death of a family member when life must begin anew. When a particular family member dies, they bury the deceased in the house floor, break and burn household items, raze the house, and build anew on top of the old. The new house then requires dedication rites to animate it – that is, for its transformation from a house to a home. Since all objects are animated, Maya perform termination rites to de-activate or de-animate them (e.g., Tozzer 1941: 151), thus releasing their soul; the Maya break or “kill” objects, partially destroy houses, and burn items and incense (Mock 1998). These same practices are indicated in the archaeological record based on the plethora of domestic dedication, funerary, and termination deposits (Lucero 2008). In fact, the depositional histories of Maya structures, small and large, reflect the continuous flow of ceremonial behaviors that in the end comprise much of the structure itself.

While dense with meaning, house rites only reveal one aspect of the Maya worldview. Outside the home is just as imbued with symbolic significance. Things in nature (such as springs, caves, water holes, mountains, etc.) that we define in our own view as non-living to the Maya were animated and played vital roles in their daily lives. Here we focus on openings in the earth and what they tell us about Classic Maya concepts of animated or sacred landscapes.

**Portals to the Underworld**

The karstic topography of the Maya lowlands consists of a limestone shelf pitted with caves and other openings. And because they open into the earth, they were and are considered by the Maya as portals to the underworld or *Xibalba* (Bassie-Sweet 1996), in which they left offerings (Andrews and Corletta 1995; Schele and Miller 1986: 42). Furthermore, these openings exude the very stuff of life – water. It is to be expected that sacredness embodies such places and that portals personify the source of water.

The earliest monumental Maya architecture is intimately linked to sacred natural features, particularly bodies of water, caves, and mountains (Stone 1992). At Copán, Fash and Davis-Salazar (2006: 134) suggest that “pyramids were mountains that provided an axis of communication with the gods and spirits; the courtyards surrounding them were the valleys and depressions that collected runoff, thereby creating shallow, watery ponds.” Palenque, in contrast, had plentiful springs and streams, and thus only had to build artificial mountains (French et al. 2006). Water and cave iconography such
as the Witz Monster (Schele and Mathews 1998: 43, 417) is found on temple doorways and signifies cave entrances (Puleston 1977; Rands 1953). Natural counterparts or “topographic shrines” were “closely allied with the notion of reciprocity … reverence for the earth will yield harmony in the natural world and prosperity for humankind” (Stone 1992: 112). Their distance or isolation from centers and densely settled areas further added to their sacred qualities and served as ideal settings for communing with supernatural forces regarding hunting, rain, ancestors, agriculture, health, wealth, and so on.

Caves

Since many caves in the Maya area are wet environments with streams, springs, rivers, pools, small lakes, and waterfalls, it is not surprising that the Maya considered them as sources of water (Bassie-Sweet 1996: 10). Contemporary Maya collect sibuy ha or virgin water from caves for special ceremonies. Caves are places of abundance and material wealth. Gods dwell within them and their power is manifested in their control over lightning, rain, clouds, wind, the land, wild animals, health, crops, and wealth (Stone 1995: 40). “The interior of the mountain is … where the owner [Earth God/Lord] keeps all types of wild animals” and is “filled with maize, water, or treasure” (Brady 1997: 603). In Yalcoba, Yucatán, “caves function … as entry and exit points at the eastern and western horizons for celestial bodies, winds, and even human souls” (Stone 1995: 36). It is believed that the sun sets, or disappears, and rises, or emerges, through caves.

Caves are also places of creation from where humans emerged, as did maize (Bassie-Sweet 1996: 11; Stone 1997). Traditional Maya view certain mountains as lineage-mountains where ancestors reside (Bassie-Sweet 1996: 16, 24, 60). Such features in the landscape ritually define borders and manifest community identity. The Maya make pilgrimages to caves, sometimes from great distances, where they propitiate ancestors, the Earth Owner, rain deities, and so on (Stone 1997).

In some parts of the Maya area, caves are perceived as symbolic “steambaths” (e.g., Chamula, Chiapas, México) (Houston 1996: 138). A sweatbath not only cleanses the body, but also “restores heat” and eliminates fevers, which, along with other illnesses, can be “sweated out” (1996: 139). As such, they are also used during childbirth.

While caves are considered sacred, they also have dangerous aspects. The ambiguity of caves is a common belief among the Maya because of what can take place in caves, such as witchcraft or the extraction of souls. For example, in some parts of the Yucatán, the Maya believe that caves house disease-producing forces (Redfield 1941: 239). Caves are viewed as conduits for supernatural forces and in which the plagues of life were disposed. The
Maya deposit animated objects imbued with sacred and dangerous qualities. For instance, the Lacandon Maya dispose of god pots or *incensarios* in caves, because they still have dangerous animated attributes (McGee 1998). Evil spirits can inhabit caves; they are often associated with isolated and unprotected – that is, dark – areas where the dead reside (Moyes 2006: 26–31). In Amatenango, Chiapas, “dangerous spirits” are believed to live in caves and hills (Nash 1970: 23). Food is placed in front of them as offerings to the spirits so that they can carry illness into the cave and subsequently into the underworld. Cave-dwelling animals were thought to be the embodiment of demons, where they cast evil spells and perform sorcery. Maya caves, thus, provide the ideal place to conduct ritual violence (e.g., Brown 2004; Lucero and Gibbs 2007).

In pre-Columbian times, the Maya left offerings in caves. As a matter of fact, caves have some of the earliest evidence for ritual activities (e.g., Brady 1995). People from all over visited caves. For example, Naj Tünich, a cave in eastern Petén, Guatemala, has painted emblem glyphs on its walls indicating that visitors came from several areas (Brady 1989: 414). While the most common association of human remains in caves likely was ancestor veneration, the Maya also killed and/or placed sacrificial victims, or perhaps even witches, in caves. Stalagmites and stalactites have been found outside caves in several contexts, because they contain “spiritual power” (Brady et al. 1997a). In certain contexts, such as ballcourts found in every Maya center, the presence of items from caves likely signifies a connection to the Hero Twins defeating the Death Lords on the ballcourt in Xibalba, as depicted in Popol Vuh, the Maya origin story (Baron 2006; Christensen 2007).

**Water Bodies**

Bodies of water are also sacred features in Maya cosmology, and the Maya treated caves and water bodies much the same. As a matter of fact, the “Maya Underworld is characterized as water, which also is a physical attribute of limestone caves” (Stone 1992: 127). This similarity is expressed in the fact that both are openings in the earth in which supernatural entities resided, and in which the Maya left offerings.

Cenotes and lakes have different characteristics; surface rivers feed into lakes. Cenotes, found largely in the northern Maya lowlands, are “karstic solution features” (Brown 2006: 174) or sinkholes fed by the relatively high water table, and are sometimes the only source of water outside of rain (e.g., Redfield 1941: 119). In the southern Maya lowlands, especially inland, the water table is too low in most parts to percolate to the surface in cenotes. This fact makes Cara Blanca even more unique, since it is one of the few areas with cenotes in the southern lowlands.
More recently in the Yucatán, the Maya believe that cenotes are the source of wind (Redfield 1941: 118): “As the water makes its cycle, carried by the rain-gods from the cenotes up into the sky to fall as fertilizing rain upon the milpa, so the winds have their sources in the sea and pass up through the cenotes” (Redfield 1941: 118). While cenotes in town have both utilitarian and sacred features, those located in the “bush” or away from habitation have sacred qualities, and must be approached carefully (Redfield 1941: 119).

Water bodies often mark the center of communities and serve as an *axis mundi* (e.g., Brown 2006). At the Early Postclassic (c. A.D. 950–1150) site of Chichén Itzá in Yucatán, Mexico, one of the most famous cenotes, the Sacred Cenote, was connected to the center via a 400 m long causeway; the “utilitarian” cenote, however, was located in the center core (Brown 2006). At the Late Classic (c. A.D. 600–750) center of Dos Pilas, Guatemala, the Maya built the major temples and palace over caves and springs, a practice that occurred at other sites, to show a ruler’s “control over water, and presumably over rain-making and fertility” (Brady and Ashmore 1999: 130). The Classic Maya placed the four largest reservoirs at Tikal approximately along the cardinal directions from the site core, a further indication of the symbolic significance of water bodies. And based on her analysis of water symbolism and artificial sunken pools and plazas, Fash (2005) argues that Copán’s Late Classic residents built sacred pools in the site core.

At the Sacred Cenote of Chichén Itzá, the Maya built a ceremonial building so close to its edge that part of it has collapsed into the water, a pattern found at a few other sites including Chinkultic, Mexico and Cara Blanca. Edward H. Thompson first dredged the Sacred Cenote in 1904 and recovered figurines, masks, bells, cups, jade, ritually “killed” objects, representations of the Maya rain god Chak, gold and copper items, and human skeletal remains (Coggins 1992). Osteological studies indicate that the “inhabitants of the well” included 23 males, 12 females, and 43 subadults. Furthermore, skeletons show evidence for perimortem violence – that is, sacrifice or ritual violence (Anda 2007). In the early Colonial period in the sixteenth century, Bishop de Landa recorded that the Maya would sacrifice adults and children to Chak in times of drought (Tozzer 1941: 180, n. 948).

The ancient Maya also left offerings in lakes. For example, divers at Lake Amatitlán, Guatemala, recovered over 400 ceramic vessels depicting spider monkeys, various fruits, flowers, snakes, lizards, and human heads. Chak and Tlaloc, the latter the central Mexican storm deity, were also represented, as well as fertility and death gods (Borhegyi 1961). The stylistic diversity of the materials from Teotihuacan in central Mexico, the central Mexican highlands, the Maya area and other regions, indicates that the lake was a place of pilgrimage for different ethnic groups. Moreover, the waters at Lake
Amatitlán are quite warm, and people may have used the lake for curative purposes; structures along the shore could have served as shrines (Borhegyi 1961). While archaeologists have investigated cenotes in the northern Maya lowlands, southern Maya lowlands cenotes remain unexplored.

The Sacred Landscape of Cara Blanca, Belize

The Valley of Peace Archaeology (VOPA) project area in central Belize had never been extensively explored prior to the beginning of our project in 1997. To get to know the area, we devised a survey strategy using a predictive settlement model developed by Scott Fedick based on agricultural potential. He evaluated agricultural potential using several factors including soil type, root zone, susceptibility to erosion, workability, drainage, and inherent fertility (Fedick 1988, 1995, 1996). Each cluster was assigned a Capability Class (I–V), with Class I having the fewest and Class V having the greatest limitations (Figure 2.2). Survey results correlated quite well with soil class
– except Cara Blanca (Lucero et al. 2004). Basically, outside of Cara Blanca, we found the highest settlement densities in Class I (alluvium) and Class II (well-drained upland) areas (Table 2.1).

Cara Blanca (literally “white face”) consists of 25 water bodies extending east-west along the base of a limestone ridge c. 80–100 m high in the northern section of the VOPA area (Figure 2.3). It is in an uninhabited expanse of primary forest currently owned by a logging company, Yalbac Ranch. The central pools are defined as cenotes because of their steep-sided walls and clear water filtered through the limestone below, while the far eastern and western water bodies are more similar to lakes (i.e., with shallow shores and gradual change in water depth). Recently, geochemist and freshwater expert Patricia Beddows, who visited Cara Blanca in May 2008, confirmed that its central pools are deep pit cenotes (pers. comm., June 2008), which are formed from below (vs. collapsed dolines). The water level may fluctuate, but they are deep enough that there is more than enough water, even in the dry season. Most of the water is drainage from the Petén, Guatemala. A map compiled by Bryson Geological Services for Anschutz Corporation in 1974 shows an east-west fault with the north side uplifted (Robert Johnston, Castle Belize Ltd., pers. comm., 1998). The two rock types at the fault are defined as Kbc (Barton Creek Formation limestone and dolomite of the Cretaceous age, 70–65 million years) and Trb (Redbank Formation clay, sands and gypsum of Miocene-Pleistocene ages, 25–2 million years). Water bodies are ringed by Class V soils (black, poorly drained clayey soils) that flood during the rainy season. Immediately beyond these clayey soils are fertile Class II soils.

In the past several seasons we surveyed the area beginning at the secondary center of Yalbac (Graebner 2002) and paralleling the pools (Kinkella 2005, 2006, 2008, 2009). We started with a Brunton and tripod to establish a transect that ran 41.5° from traverse point YL at Yalbac to the closest pool, Pool 7, some 4 km distant (Kinkella 2006: figs. 3.1–3.2). In accordance with other survey projects in the Belize Valley area (see Ashmore 1996), we used a 400 m-wide transect; it is not possible to do complete coverage due

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<tr>
<td>I</td>
<td>97/84</td>
</tr>
<tr>
<td>II alluvial</td>
<td>48/48</td>
</tr>
<tr>
<td>II non-alluvial</td>
<td>189/157</td>
</tr>
<tr>
<td>III</td>
<td>0</td>
</tr>
<tr>
<td>IV</td>
<td>0</td>
</tr>
<tr>
<td>V</td>
<td>19/11</td>
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Table 2.1. Structure density in the VOPA area (from Lucero et al. 2004).
to heavy jungle growth and the amount of time it would take. Twenty-five meters was the maximum line-of-sight distance possible; the survey team walked the transect back and forth at 50 m increments until a width of 400 m was attained. A Garmin Venture GPS was used in tandem with 1:50,000 government maps to record mounds, mound groups, pools, features, and elevations. Sketch maps were made of all solitary mounds and small mound groups using pace and compass. Larger mound groups were mapped using a total station.

Most of the survey was completed in summer 2007 (Kinkella 2008). Results have revealed the following locations of notable settlement clusters, each defined by a different set of characteristics (Figure 2.4):

1. The Yalbac site core
2. A large patch of Class II soil between Yalbac and Pool 7
3. The minor center of M104, two km northeast of Yalbac
4. A concentrated “lookout” area or pilgrimage destination on top of a high ridge above Pool 15
5. The area in the vicinity of Pool 1
6. The minor center of M124 immediately northwest of Pool 6

In most cases, mounds are typically located on slightly higher ground, likely to avoid flooding during the rainy season. The mounds range in size from less
than one meter to approximately 5 m in height (Kinkella 2006). The majority of surface ceramics, as well as those found in controlled excavations, date to the Late Classic period, or c. A.D. 700–900 (Kinkella 2000, 2009).

Large caves have not been found in the Cara Blanca area, likely due to the soft marl limestone present in the area – which would also explain the “white face” (i.e., so soft that pieces broke off, or “incompetent” limestone) (Beddows, pers. comm., June 2008). This being said, several smaller caves have been noted (c. 8 m deep from drip line with c. 4 m high ceiling) which may have been adequate for ritual purposes (see Kinkella 2009). The lack of large caves might also further increase the significance of the water bodies as the only major portals in the area (Patricia Beddows, pers. comm., June 2008).

We have visited the westernmost 16 of the 25 pools (nos. 1–16), four of which have associated structures near pool edges: Pools 1, 7, 8, and 9 (Figures 2.5–2.6). The survey we conducted in the surrounding cliffs to the north and bajos (seasonal swamps) to the south has thus far revealed little additional settlement. Soils are generally of poorer quality (Class III, IV, or V soils) with relatively severe restrictions for agriculture (Lucero et al. 2004). Pool 1 measures approximately 100 × 60 m and is surrounded by seven mounds (Figure 2.7). Looter’s trenches show that the largest structure (Str. 1, 22 × 15 m, 4 m tall) is a vaulted range building consisting of six rooms,
three to a side, radiating out from a central spine wall with a series of four pillar-like walls that run the poolside length of the structure. It is similar in form to one of the range structures at the nearby center of San Jose (Str. C5) (Thompson 1939: 59–60). The structure sits so close to the pool’s edge that it is eroding into the water. Test excavations at Str. 1 yielded predominantly (63%) Late Classic jars (c. A.D. 700–900) (Kinkella 2000, 2004) – not the typical domestic assemblage consisting of a more consistent distribution of jars, plates, bowls, and vases (Lucero 2001).

In 1998 two divers explored Pool 1 to c. 20 m below its surface without reaching bottom (c. 50+ m) and recovered two sherds from the steep sidewall at a depth of c. 10 m (Kinkella 2000; Osterholtz 1999). Since both sherds were found immediately below a Str. 1 looter’s trench, we at first surmised that they comprised looter’s debris (Kinkella 2000); however, recent research conducted by Kinkella indicates that the Maya may have purposely placed the sherds in natural or artificial niches along the cenote sidewalls.

A larger group of mounds is found approximately 400 m to the west of Pool 1, equidistant between Pools 1 and 2. Pool 2 is located about 1 km west-southwest of Pool 1, and Cara Blanca got its name from the steep white cliffs directly above it. The settlement includes a substantial number of mounds (c. 15), including several range structures and a sweatbath (M186) (Kinkella

Figure 2.5. Settlement at Pool 8 (from Kinkella 2009: fig. 5.13).
Figure 2.6. Pool 9 (adapted from Kinkella 2009: fig. 5.15).

Figure 2.7. Structures at Pool 1 (from Kinkella 2009: fig. 4.7).

2008). We excavated a 1 × 1 m unit on one of the smaller structures (M170) in order to obtain ceramic sherds for dating purposes, but immediately came upon a burial (the only one so far encountered in the pool area). We left the remains in situ, but collected the remnants of two burial vessels from above the skull. Both dated to the Late Classic, and their styles suggest that its
inhabitants may have interacted more with people to the north at sites such as La Milpa, Chan Chich and others, rather than with Maya of the Belize Valley proper to the south.

Pool 7 (c. 130 × 30 m) is the westernmost pool, and settlement on its eastern side consists of eight low range structures forming a double plazuela group. In 2005, we placed a 1 × 1 m test pit in the middle of Plaza 2 to collect chronological information. As was the case elsewhere, virtually all ceramics date to the Late Classic (c. A.D. 700–900) and consist mostly of jars (Kinkella 2006). Pools 8 and 9 appear to comprise one settlement group and is the smallest of those yet observed around pools. Pool 8 (c. 70 × 30 m) has six small mounds along its southern edge, and Pool 9 (c. 300 × 60 m) has three low mounds on a single platform (M9) on the south side and is bordered on the northwest by a sheer cliff. One test pit was placed in a mound at each pool, but neither yielded much information, barring a few Late Classic ceramic sherds (Kinkella 2008).

Although it is not directly on the edge of the water, there is also settlement near one of the lakes, Pool 6, which appears to be the largest water body in the vicinity according to the government map. It is located on the eastern edge of the ridge system (Lucero 1999a). In the foothills above Pool 6, we found
a mound group with a plain stela and altar (M124) (Figure 2.8). It sits on top of a small knoll, and has six structures built around a central plaza. Test excavations at the base of the stela yielded several Late Classic sherds, as did the test excavation at the corner of one of the structures (Kinkella 2008).

Cara Blanca pools are often covered with water lilies, which played an important role in Maya cosmology. We have briefly mentioned the artificial reservoirs at centers on which the Maya relied during annual drought, which water managers had to keep clean, a challenging feat. However, they clearly recognized the significance of the wetland biosphere and applied its principles by maintaining a balance of hydrophytic and macrophytic plants and other organisms to maintain clean water (Lucero in press). The presence of water lilies (*Nymphaea ampla*) is a visible indicator of clean water, since they are sensitive hydrophytic plants that can only flourish in shallow (1–3 m), clean, and still water (Conrad 1905: 116; Lundell 1937: 18, 26). The water lily is also associated with purity and is a symbol of abundance (Schele and Miller 1986: 46). Maya rulers appropriated water lilies to symbolize their abilities to bring forth prosperity (Lucero 1999b), and their representation is common in royal iconography, from painted ceramic vessels to carved monumental buildings and monuments (e.g., stelae and altars), bone, obsidian, shell, jade, and chipped stone. This cosmologically significant water flower is yet another sacred element found naturally in abundance at Cara Blanca.

We also noted crevices, rock shelters and undulating topography in several areas, including the immediate vicinity of the satellite center (M104), the largely uninhabited area near Pools 10 through 14, and especially in the drainage above Pool 15. While such an area is poor for farming, rock shelters may have been used for rituals, indicated by the sherds found at several of them. Further, one of the small mound groups mapped between Yalbac and Pool 7 (M6) includes a 3-m tall mound that is perched at the summit of a sheer cliff with a 6-m drop (Kinkella 2006: fig. 3.7). The cliff has a vertical fissure about 1.5 m wide and 5–6 m deep in the center, which travels directly underneath the front of the structure and is easily large enough for a person to fit into. This natural fissure into the earth may have had ritual significance, as well as its associated building.

Finally, even though “experiential” surveying (see Bender 2002) was not part of our plan, we could not help but notice the sometimes difficult terrain or the cool breeze that forewarned us of nearby portals. The view from the top of the ridge looking south is amazing, and likely was quite similar for the Classic Maya, though we will never know what they felt or thought about it. It is possible to see Cara Blanca from several kilometers to the south. Though we do not know if it was visible in the past due to tall trees, if it were, it would have served as an obvious beacon to signal the location of the sacred.
Discussion

The Maya constructed centers to function as artificial water mountains, where the site itself acted as a water collection device, directing water into the central reservoir system, which provided the means for centralizing power through water control. Such building was unnecessary at Cara Blanca. The bodies of water are relatively isolated from settlement and functioned as “shrines removed from daily life” (Freidel 1981: 380) where the Maya engaged in “scheduled periodic circulation of large numbers of people over broad sacred networks” (Freidel 1981: 378). Furthermore, during the Late Classic period there were “area-wide water cults, which included pilgrimages to ‘sacred’ water localities, and ritual offerings of elite goods and human victims to water and other deities” (Andrews and Corletta 1995: 112). This need became even greater at the end of the Late Classic when droughts struck (Lucero 2002, in press).

Sweatbaths, such as the one found between Pools 1 and 2, are also found elsewhere in the Maya area, even within temples and other types of monumental architecture (e.g., at Palenque and Piedras Negras, among others; Houston 1996). Some apparently were only “symbolic” ones since there is no evidence for fire or heating apparatus. Houston (1996: 135) suggests that, at the Palenque Cross Group, the sweatbath demonstrated the “connection between the Cross Group and mythological births” of Palenque’s patron deities, and provided a place “linked to divine birth and purification” (1996: 147). While Houston focused on symbolic sweatbaths, recent excavations have revealed functional ones at large centers, small settlements, and even caves. Ethnographically, they are used for healing, purification, and transformation rites. “In indigenous communities today, sweatbaths are symbolically viewed as caves or entrances to the underworld…” (Child 2007: 242). The Maya at Cara Blanca did not need to build temples to house its sweatbath (M186), since hills are plentiful.

The concentration of so many pools in one area and the relatively small-scale and somewhat unique settlement indicate that Cara Blanca served as a sacred place to the ancient Maya, likely as a pilgrimage center (Kinkella 2009). Spanish documents detail the importance of pilgrimage at Cozumel, “centered on the Maya deity Ix Chel, the goddess of fertility, childbirth, divination, and medicine” (Patel 2005: 91). Pilgrimage sites could have acted as hubs that maintained group cohesion for a dispersed populace. Throughout Mesoamerica, people made pilgrimages for the sake of water deities, patron gods, and divine entities (Kubler 1985). Similarities to pilgrimage sites elsewhere (e.g., Cenote of Sacrifice at Chichén Itzá) and other types of evidence, such as the predominance of jars, indicate that
Cara Blanca served as a place of pilgrimage. Jars are used in the utilitarian movement of water, but they also can symbolize water creation and were used in water rites (Taube 2001). In fact, the Maya may have collected sacred or virgin water in jars for special ceremonies that took place either at the Cara Blanca pools or in nearby centers, similar to the Zinacantecos of highland Chiapas, Mexico, where shamans’ assistants collect water from the seven sacred waterholes for curing ceremonies (Vogt 1993: 63–65). A comparison of Cara Blanca jars and artifacts with collections from the centers of Yalbac (c. 7 km distant), San Jose (c. 11 km distant), Saturday Creek (c. 11 km distant) and others, can reveal if people from different areas deposited offerings in pools and collected sacred water, something we plan to do in future once we dive several of the pools.

Other future plans include exploring the surrounding caves, in which we expect to find offerings. In 2008, Kinkella found several caves in the vicinity of Pool 15, one of which contained two hearth-like features. One of the features had a large jar rim laying on the surface. Interestingly, Moyes (2006: 567–569), in her analysis of Late Classic ceramics from several caves in Belize (e.g., Chechem Ha), found that jars were the most common vessel type recovered. Based on their placement and location, she goes on to suggest that associated rituals represent “a distinct Late Classic cave cult likely to have been associated with dry or drought conditions. Given the deep antiquity of Maya beliefs that associate caves with gods that control water, in a time of environmental crisis caves would have been the logical ritual venue to propitiate these deities” (2006: 568–569). The same could be argued for Cara Blanca. Interestingly, we have yet to see water levels drop in the pools, even at the height of the dry season.

Cara Blanca provides clues about the importance of the natural feature within the ancient Maya worldview, especially based on what is absent from such a water-rich area – the built, or in one sense, the profane. It is an excellent example of a “topography of ancient belief,” to use a phrase from Bradley (2000: 20). The Maya journeyed to Cara Blanca because they valued “water mountains.” This case illustrates how the Maya viewed their world; they were part of it, and did not separate it in what Western society defines as natural and cultural aspects. Just because people did not build “natural” places does not mean that supernatural forces did not build them (see Bradley 2000: 35). As such, the Maya did not interfere with such a place, even at the expense of their more basic needs – water and land.

In conclusion, the ancient Maya expended much effort at centers to build artificial mountains, caves, and pools. This effort was unnecessary at Cara Blanca, where natural places embodied the sacred. By the very absence of the constructed, the Maya left us with another view of the landscape, one
we need to assess through a sacred lens. It is we, after all, who distinguish natural places from cultural ones. Many pre-modern societies, however, were “in harmony with nature” (Rykwert 1981: 75), while our methods typically are not. Cara Blanca has provided us the opportunity to “see” places just as central to the Maya, if not more so, than what they themselves added or built on the landscape. As a matter of fact, the Maya purposefully avoided building at Cara Blanca, so as not to interfere with this sacred place; there was no reason to change it from its natural state.

References

Anda, Guillermo de

Andrews, Anthony P., and Robert Corletta

Anschuerz, Kurt F., Richard H. Wilshusen, and Cherie L. Scheick

Ashmore, Wendy

Bacus, Elisabeth A., and Lisa J. Lucero

Baron, Joanne P.

Bassie-Sweet, Karen

Bender, Barbara

Borhegyi, Suzanne de
Bradley, Richard


Brady, James E.


Brady, James E., and Wendy Ashmore


Brady, James E., Ann Scott, Hector Neff, and Michael D. Glascock


Brady, James E., Ann Scott, Allan Cobb, Irma Rodas, John Fogarty, and Monica Urquizú Sánchez


Brown, Clifford T.


Brown, Linda A.


Child, Mark B.


Christenson, Allen J.


Coggins, Clemency C. (ed.)


Conrad, Henry S.

de Montmollin, Olivier  
1995 Settlement and Politics in Three Classic Maya Polities. Prehistory Press, Madison, WI.

Eber, Christine  

Fash, Barbara W.  

Fash, Barbara W. and Karla L. Davis-Salazar  

Fedick, Scott L.  


Fedick, Scott L. and Anabel Ford  

Ford, Anabel  


Freidel, David A.  

Freidel, David A. and Jeremy A. Sabloff  
1984 Cozumel Late Maya Settlement Patterns. Academic Press, Orlando.
French, Kirk D., David S. Stuart, and Alfonso Morales

Gunn, Joel, Ray T. Matheny, and William J. Folan

Haviland, John B.

Hellmuth, Nicholas N.

Helmke, Christophe G.B.

Helmke, Christophe G.B., and Jaime J. Awe

Hooten, E.A.

Houston, Stephen D.

Ishihara, Reiko


Kinkella, Andrew


Kubler, George


Lucero, Lisa J.


Lucero, Lisa J., Scott L. Fedick, Andrew Kinkella, and Sean M. Graebner

Lucero, Lisa J., and Sherry A. Gibbs

Lundell, Cyrus

Marcus, Joyce

Marx, Robert F.

McGee, Ron J.

Mock, Shirley B.

Moyes, Holley


Nash, June
1970 In the Eyes of Ancestors: Belief and Behavior in a Mayan Community. Waveland Press, Prospect Heights, IL.
Neiman, Fraser D.

Osterholtz, Anna

Patel, Shankari

Prufer, Keith M.

Prufer, Keith M., Phil Wanyerka, and Monica Shah

Puleston, Dennis E.

Rands, Robert L.

Redfield, Robert

Rykwert, Joseph

Sanders, William T.
Saul, Frank P., and Julie M. Saul

Scarborough, Vernon L.

Scarborough, Vernon L., Fred Valdez, and Nicholas Dunning (eds.)

Scarborough, Vernon L., and Gary C. Gallopin

Schele, Linda, and David Freidel

Schele, Linda, and Peter Mathews

Schele, Linda, and Mary Ellen Miller

Sharer, Robert J.

Stone, Andrea


Stuart, David

Stuart, David, and Stephen Houston
Taçon, Paul S.C.


Taube, Karl A.


Thompson, J. Eric S.


Tozzer, Alfred M.


Vogt, Evon Z.


Vogt, Evon A., and David Stuart


Walker, William H., and Lisa J. Lucero