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Ritual Intensification and Regional Interaction in Terminal Classic Belize: A Comparative
Analysis of the Ceramics of Cara Blanca and Saturday Creek

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Anthropologists have long been concerned with social change. From the beginnings of the field, anthropologists have asked why and how social structures change, cultures fluoresce and seemingly fade away, and how social structures come to be established (Fried 1967; Service 1962; Steward 1955; Tylor 1871). These questions have become more nuanced, but anthropologists today are still concerned with how and why social change happens. One of the most pressing issues facing anthropologists today is social change in response to severe environmental pressures such as climate change, sea level rise, and drought.

This paper examines a socially, politically, and environmentally turbulent period of precolumbian Maya history (700-900 C.E.) by accessing the possibility of pilgrimage at a sacred site in the hinterland of central Belize. This analysis is informed by two main bodies of social theory: landscapes and materialism. Human history is enacted in a spatial and temporal dimension, thus landscapes are critical actors in historical narratives. Additionally, the material qualities of objects and places are crucial in shaping and facilitating social life. Archaeologists are inherently concerned with materiality, as our research begins with the physical traces of the past. Thus, materiality must be considered as an active player in not only the lives of past people but also in molding our own interpretations. This research builds on both landscape archaeology and new materialism to understand how people, places, and things converge to create new social worlds.

This paper analyzes the Terminal Classic (800-900 C.E.) ceramics recovered from three Maya sites in an attempt to understand how people dealt with turbulent social and environmental changes through ritual intensification. Unlike most researchers studying the Terminal Classic, I emphasize non-violent, non-elite means of negotiating these changes. Specifically, I consider the evidence for pilgrims arriving at the Cara Blanca pools from far-flung communities within the Maya region. Pilgrimage to the Cara Blanca pools would be suggested by the presence of non-local ceramic types that reflect regional interaction. The diverse ceramic assemblage of Cara Blanca does seem to indicate that long-distance social ties representing a new social field emerged around ritual practices at the sacred pools. This study contributes to our understanding of the Terminal Classic ceramics of the southern lowland hinterlands, ritual practices at a time of climatic instability that threatened the lives of farmers dependent on predictable rainfall, and the emergence of new social and economic networks as long-standing social, political, and economic systems fractured and failed.

Theoretical Background

The spatial dynamics of social change are crucial to answering such questions about how, why, and where social transformations occur. The relationship between people and space permeates anthropological work. Many anthropologists are concerned with landscapes created by humans, such as urban landscapes (Mayne and Murray 2001), while others focus on sacred landscapes and the natural environment. Brady (2009) studies Andean *huacas*, or ancestral sacred locations that define ancient and modern Andean landscapes. Landscapes are often integral parts of the construction of personhood as seen in the case of the Nayaka of India (Bird-David 1999). Naming the landscape also creates new, emerging relationships between people and places (Whitridge 2004). Ethnographic studies of sacred landscapes focus on pilgrimage to modern shrines, such as the mountain shrines used by contemporary Maya living in the highlands of Guatemala and southern Mexico (Brown 2004). Colson (1997) discusses natural shrines as spaces that are deeply embedded in conceptions of the local. In this paper, I expand

that discussion by presenting a natural sacred place as the focus of regional pilgrimage based on the ceramics.

Finally, a growing body of theoretical work explores materiality and the ways in which people and things construct fields of meaning. Bennett (2010) draws on Deleuze and Guattari (1987) to explore the social agency of things. Her work emphasizes the ability of materials to engage in political action within and beyond human social realms. Chen (2012) also places the affective powers of things at the foreground of social analyses. Deleuze and Guattari (1987), Delanda (2006) are concerned with how materials and people create social assemblages that take shape according to the physical and social affordances and qualities of each part of the emerging whole. These authors influence my own thinking about the ways that people and materials engage with one another to transform the world. New materialism disrupts typical anthropological thought by framing objects, places, humans, and other-than-humans as equal actors in the construction and negotiation of social fields. Archaeologists such as Sillar (2009) are beginning to draw on new materialist theory to better understand the past and the relationships between people, places, and things that frame the worlds we inhabit. This paper draws on new materialism to consider how people and things are enmeshed in emergent, changing worlds, using the ancient Maya as a case study. Specifically, I examine the ways that different people and ceramics converge at sacred pools to create new ways of being in the world.

Severe climate change episodes and resulting social reconfigurations have impacted human societies around the world throughout time. Archaeologists studying how people react to climatic instability have often focused on elite responses and emphasize social collapse over human resiliency (Haug et al. 2003; Turner and Sabloff 2012). The most notorious example of this body of anthropological literature is Jared Diamond's (2005) *Collapse*. Perhaps the most common environmental crisis faced by human societies around the world is drought. The impact of severely reduced water supplies on urban societies often results in diasporic population movements away from cities. Sri Lanka and Angkor are two examples of urban civilizations that declined rapidly after facing severe drought episodes (Lucero et al. in press). In the New World, the ancient Maya are the best known example of an urban society that experienced dramatic social change related to severe climatic instability.

In the Maya area, the transition from the Late Classic (600-900 C.E.) to the Postclassic (900-1500 C.E.) has been presented as a time of abandonment, warfare, and political collapse (Demarest et al. 2007; Santley et al. 1986). Demarest (2004:102-104) writes that "the breakdown of [the Classic Maya royal system] began with wars" and describes the Terminal Classic as "a period of endemic war." These studies emphasize the experience of elites living in cities and fail to consider how ordinary Maya farmers experienced these phenomena. Non-violent responses to climatic and social upheaval, such as ritual intensification, should also be considered. This paper contributes research on social change, sacred landscapes, and materiality by examining how the ancient Maya sought to ameliorate dramatic environmental and political changes through intensified ritual at a sacred site (see Lucero and Kinkella 2015) through an examination of the ceramic assemblages of two sites in central Belize, Saturday Creek and Cara Blanca.

Archaeologists are inherently concerned with material culture, as that is often all that remains of past cultural practices. Due to their ubiquity and preservation, ceramics are one of the most commonly studied artifact classes at archaeological sites. Pottery is of interest to archaeologists and ethnographers alike, as many people around the world have rich histories of pottery production that continue into the current day. Although ceramicists do not always agree

about ware classifications and ceramic chronologies, pottery analysis is crucial to archaeology (Rice 2013:11; Smith 1979). Ceramic studies are significant because pottery appears around the world, preserves well, and plays important roles in daily life. Ceramic studies also reveal important information about manufacturing technologies (Rice 2005:24-25). The implications of ceramic studies transcend space and time to inform the past and the present. Ceramics are chronologically sensitive and reflect regional interactions because particular manufacturing techniques, materials, and decorative styles can be associated with particular production areas and communities. The exchange of ceramics across geographic regions and polities has been used to assess social interactions and economic networks as well as socio-economic status (Arthur 2002; Brumfiel 1991; Bowser 2000; Smith et al. 2003). Ceramic studies tend to focus on classifying pottery, analyzing decorative motifs, and analyzing the composition of pottery through visual and chemical characteristics (Rice 2005:25). This analysis takes a classificatory approach to understand regional interaction through ceramic type and vessel form frequencies at several Late Classic Maya sites in central Belize.

Through an analysis of ceramics recovered from ritual structures at the Cara Blanca pools, this paper uses the Maya as a case study for understanding social change and sacred landscapes in prehistory. The ancient Maya faced the social, political, and environmental upheaval of the Terminal Classic in a variety of ways. One way that people dealt with such dramatic change was through ritual intensification, including pilgrimage to distant sacred sites. Ritual structures at the Cara Blanca pools were built in the Late Classic II/Terminal Classic (700-900 C.E.), and may have drawn pilgrims from throughout the Maya lowlands (Lucero and Kinkella 2015). This suggests two possible scenarios: either pilgrims may have traveled to Cara Blanca, or the pools may have been used and maintained by local people. If pilgrims traveled from distant communities to visit Cara Blanca, then the Cara Blanca ceramic assemblage should reflect these diverse long-distance ties through the presence of more non-local ceramic types than is typical of minor centers in central Belize such as Saturday Creek and Barton Ramie. If ritual at Cara Blanca was primarily conducted by local communities, then the Cara Blanca ceramic assemblage should be more similar to minor centers in central Belize and include fewer non-local ceramic types.

The Precolumbian Maya

The precolumbian Maya are one of the best known cultures of Mesoamerica. The Maya area includes present-day southern Mexico, Belize, Guatemala, Honduras, and parts of El Salvador. This area is further subdivided into three ecological regions: the northern lowlands of Yucatán, the southern lowlands of eastern Guatemala and Belize, and the southern highlands of western Guatemala and southwest Mexico (Sharer and Traxler 2006). The precolumbian Maya, like other Mesoamerican societies, relied on long-distance trade to procure exotic goods such as obsidian and jade, as well as dietary staples such as salt produced at coastal sites in southern Belize and northern Yucatan (McKillop 2005b). Cultural hallmarks of the ancient Maya include astronomy, mathematics including the concept of zero, and a sophisticated calendrical system (Houston and Inomata 2009). Politically, the Classic Maya area was divided into competing centers governed by semi-divine kings (Chase and Chase 1996; Demarest 1992; Lucero 1996:39). Political power was centered on major centers with dense, urban populations and noble courts, such as Tikal and Copan (Houston and Inomata 2009:131). Monumental

architecture, such temples and elite palaces, reached its peak during the Classic Period, and is associated with stelae, stone monuments carved with royal histories and iconography.

Although archaeological research historically emphasized elites over commoners, the vast majority of the Maya were farmers living in minor centers or small hinterland communities (Robin 2003). Minor centers are found along the fertile alluvial floodplain of the Belize River, positioned near abundant land and water resources that supported small, relatively wealthy agricultural communities. Minor centers such as Saturday Creek tend to be found at lower elevations and have higher rainfall than major centers like Tikal, and receive sufficient water from rainfall and seasonal inundation to support agriculture without irrigation (Lucero 2006:70-71). In contrast, major centers such as Tikal are located in areas where the seasonal difference in water availability requires large-scale water management systems to support urban populations year-round (Scarborough et al. 2012).

Archaeologists studying the Maya have often focused their research on the Classic Period (250-900 C.E.). The Classic Period is considered to be the apogee of precolumbian Maya society, when social and political complexity reached its peak, and is further divided into the Early Classic (250-600 C.E.), Late Classic (600-800 C.E.), and Terminal Classic (800-900 C.E.). The Classic Period is defined chronologically by the dates of the first and last carved stelae, which began in 292 C.E. and end abruptly at 909 C.E. (Sharer and Traxler 2006:301). Polychrome pottery is another material marker of the Classic Period, as it was particularly widespread during this time (Sharer and Traxler 2006:378).

Towards the end of the Classic Period, the southern Maya lowlands experienced significant environmental upheaval that coincides with the beginning of the period of social and political change known as the Terminal Classic. A series of multiyear droughts caused environmental stress that impacted ancient Maya farmers (Medina-Elizalde et al. 2010). This climatic instability was a significant factor in the sociopolitical upheaval of the Terminal Classic, and sacred water bodies likely played an important role in the ways that Maya farmers negotiated unpredictable rainfall and shifting political affiliations (Lucero 2002a; Lucero et al. 2011; Lucero and Kinkella 2015). During the Terminal Classic, royal power failed and the great cities were abandoned as people move from the southern lowlands to areas with more abundant resources (Aimers 2007; Chase and Chase 2005:25; Rice et al. 2004:9). Material traces of the Terminal Classic are ephemeral, and most archaeological research at this time focuses on elite political collapse and warfare (Cowgill 1988; Demarest et al. 2007; Inomata 1997).

The Terminal Classic is a socially and politically tumultuous period with a limited material record. Although the Classic Maya collapse was originally seen as a rapid event, archaeologists now understand it as a “lengthy and continuous process” of movement and social transformation (Chase and Chase 2004:13). While social and political traces of the Terminal Classic social reorganization of power are easily detected in the movement of urban populations to the northern lowlands and the reorganization or dissolution of elite power structures, the material traces of the Terminal Classic are limited to relatively minor variations in ceramic styles. The original definition of Terminal Classic ceramics was based on a horizon identified in the transitional ceramics of two major centers in the Petén, Uaxactun and Tikal (Rice et al. 2004:3). This definition has been expanded by ceramic studies conducted in Belize, particularly in northern Belize, the Sibun Valley, and the Belize Valley.

In central Belize, Terminal Classic ceramic assemblages are characterized by jars with everted flat, beveled, or pie-crust lips, the emergence of new ceramic types, and a shift towards new ceramic traditions influenced by the northern lowlands (Gifford et al. 1976:278; Harrison-

Buck 2007:231). Despite these well-recognized distinguishing traits, Terminal Classic ceramic assemblages are often difficult to parse out from transitional Late Classic II ceramics. The task is complicated by the extreme regional variation in Belizean Terminal Classic assemblages, especially since the majority of Terminal Classic ceramic studies focus on either the upper Belize Valley or northern Belize, with little focus on hinterland sites of central Belize. The sociopolitical and material differences between large urban sites and smaller hinterland communities further complicate the endeavor. A comparative approach to the Terminal Classic at different sites helps us to better understand how different segments of society experienced the social, political, and economic changes that occurred at the end of the Late Classic in central Belize.

Regionally, there is great diversity in the material culture of ancient Maya centers throughout Belize. The ceramic assemblages of sites in western, central, southern, and northern Belize reflect the different social and material changes that communities living in each region experienced (Fry 2013). The upper Belize Valley, represented by the urban center Xunantunich, is closely linked to the Petén (Figure 1). Like other royal cities, Xunantunich is abandoned by the Postclassic (LeCount 1996). The ceramic assemblages of the upper Belize Valley mirror the changes occurring at royal centers like Tikal, and are marked by a dramatic decrease in the quantity and quality of polychrome vessels (Rice and Forsyth 2004:35). To the east, Belize Valley sites of central Belize such as Barton Ramie and Saturday Creek also reflect the changes happening at the larger centers of the Petén and the upper Belize Valley. The ceramics of Barton Ramie, which were analyzed by Gifford et al. (1976), are used to define ceramic types in central Belize.

Table 1. Precolumbian Maya Chronology for the Southern Lowlands

Period	Date
Late Preclassic	300 B.C.E. – 250 C.E.
Early Classic	250 C.E. – 600 C.E.
Late Classic I	600 C.E. – 750 C.E.
Late Classic II	750 C.E. – 900 C.E.
Terminal Classic	800 C.E. – 900 C.E.
Early Postclassic	900 C.E. – 1250 C.E.
Late Postclassic	1250 C.E. – 1521 C.E.

Gifford et al. (1976) defined the Spanish Lookout complex for Late Classic ceramics of the Belize Valley, and this complex has been applied throughout central Belize, such as Saturday Creek. Conlon and Ehret (2002) use Gifford et al. (1976) in the original analysis of Saturday Creek, although this paper revises that analysis according to Harrison-Buck (2007) and Mock (1994). Barton Ramie and Saturday Creek are minor centers located on the alluvial floodplain of the Belize River that were occupied from the Preclassic well into the Postclassic (Gifford et al. 1976; Conlon and Ehret 2002). During the Late Classic, the ceramic assemblages of sites in the Belize Valley were tied to the Petén, particularly through polychrome types and frequencies (Rice and Forsyth 2005:36). In this region, the Terminal Classic is typified by the near absence of ash tempered wares and polychromes (Rice and Forsyth 2004:37). Late Classic II/ Terminal Classic ceramics from sites in north-central Belize, such as San Jose and Yalbac, have been defined according to the Spanish Lookout complex (Rice and Forsyth 2004:38; Thompson 1939), although this paper challenges the assumption that people living in north central Belize

and the Belize Valley had similar experiences during the Terminal Classic. Outside of the Belize Valley, the Terminal Classic manifests differently. Harrison-Buck (2007) defined the Terminal Classic ceramics of southern Belize based on sites in the Sibun Valley, including Hershey, Obispo, and Oshon. Finally, the Terminal Classic ceramics of northern Belize are best understood through the ceramic assemblages of coastal sites such as the Northern River Lagoon (Mock 1994).



Figure 1. Map of Central Belize showing Saturday Creek and Cara Blanca, as well as other sites mentioned in the text.

This paper examines two areas in central Belize, Cara Blanca Pools 1 and 20 and Saturday Creek, in an attempt to better define the Terminal Classic ceramics of central Belize and to refine our understanding of the ways in which long-distance interaction networks are reshaped during this time. I particularly focus on Cara Blanca, as the *cenotes* and pools are unique features to the region that are deeply embedded in the sacred landscape. I begin this paper by providing a background on Saturday Creek and the ceramic analysis conducted in 2001 by Conlon and Ehret (2002). Next I present Cara Blanca and discuss archaeological excavations conducted at Pool 1 in 2013 and 2014, and excavations at Pool 20 conducted in 2014. These excavations provided the materials for my ceramic analysis. After describing the methods used in my ceramic analysis, I describe the results of my analysis and discuss the ceramics from a comparative perspective to consider how the assemblage fits within Terminal Classic period ceramics of central Belize and, more broadly, the Maya lowlands. Finally, I conclude with a review of this analysis and its contributions to Maya archaeology and current anthropological theory.

The Study Area

Saturday Creek is a minor center in Cayo District, Belize. The site is located north of the Belize River near its namesake tributary, Saturday Creek (Figure 2). Saturday Creek was first settled in the Late Preclassic, around 600 B.C.E., and occupation of this thriving agricultural community continued well into the Postclassic. The community survived the environmental and social upheaval of the Terminal Classic, and was abandoned around 1500 C.E., shortly before the Spanish Conquest (Conlon and Ehret 2002:19; Lucero 2006:79). The Valley of Peace Archaeology (VOPA) project, under direction of Dr. Lisa Lucero, mapped some 79 structures dispersed across 0.81 km². Settlement at Saturday Creek mostly consists of solitary mounds, as well as plazuela groups, small temples, and a ball court (Lucero 2006:73). Although Saturday Creek society was stratified, there was no kingly ruler and most commoner farmers were relatively wealthy.

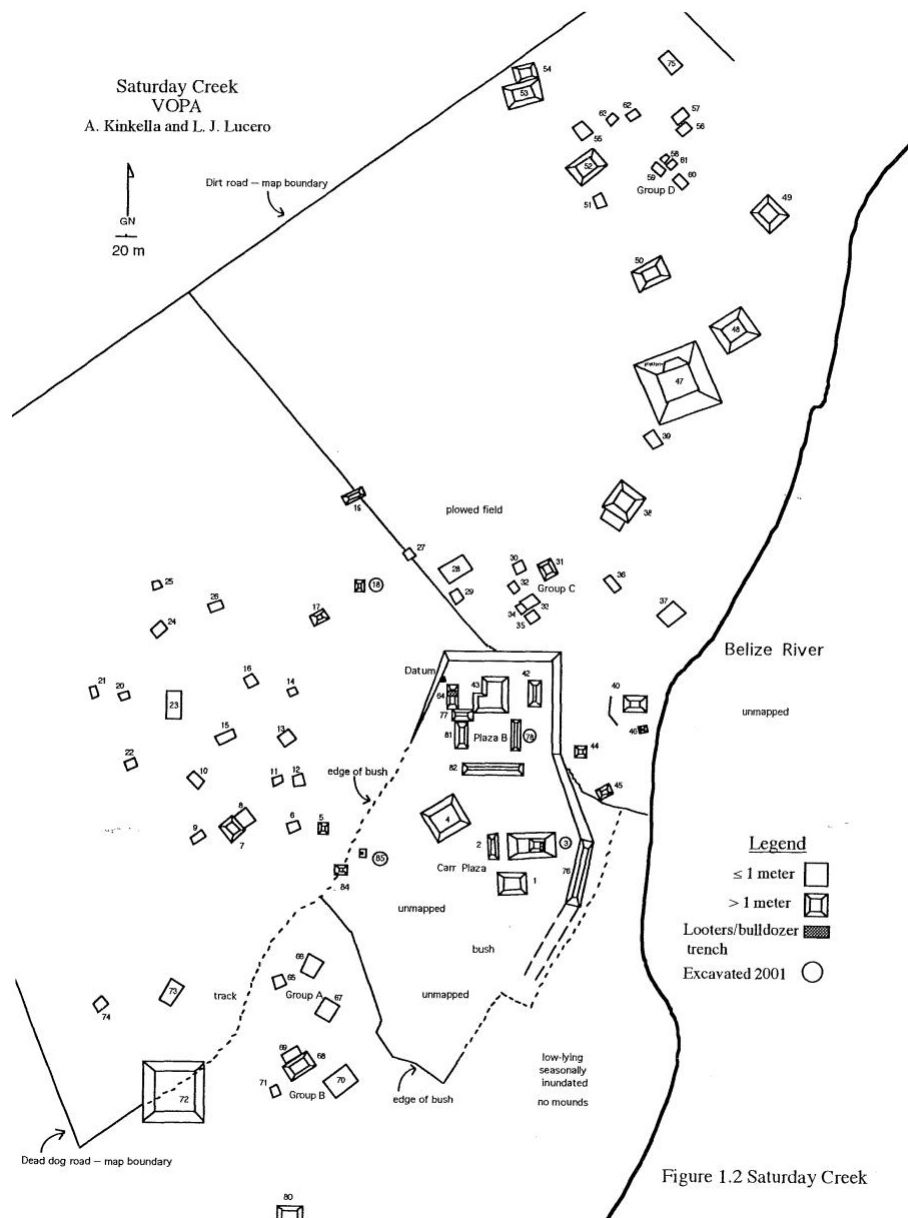


Figure 1.2 Saturday Creek

Figure 2. Saturday Creek site core. Adapted from Lucero 2002b, Figure 1.2.

Rather than focusing on a narrow social segment of the community, I am as inclusive as possible in my definition of Terminal Classic ceramics at Saturday. In order to avoid emphasizing either elite or commoner material culture, I include ceramics excavated from elite, wealthy commoner, and less affluent commoners. I additionally include the ceramics of one temple to reflect the materials found at a monumental, ritual structure. Including both ritual and residential ceramics from across the social spectrum better captures the diversity of ceramic types and forms during the Terminal Classic. In this way, I will be better able to assess the ritual or residential nature of the Cara Blanca pools. No Maya site should be viewed as strictly ritual or strictly residential; ritual and daily life were woven together and inseparable (Robin 2012:113). Although Maya rulers conducted public ritual performances on a grand scale,

ordinary Maya people performed similar rituals within their homes (Inomata 2006). Maya houses were ensouled, and each stage of construction was marked by dedication and/or termination rituals that often included offerings of ceramic vessels (Lucero 2006:2). Ancestors were often interred below the floors of ancient Maya houses beginning in the Preclassic, and ancestor veneration was an important part of life (Lucero 2006:81). The ceramics analyzed here come from both elite and commoner residences, as well as one temple. By examining a broader cross-section of Terminal Classic Saturday Creek, I hope to better understand the full range of ceramic variation during this period.

Cara Blanca is formed by a series of pools on the southern edge of Orange Walk District. Unlike Saturday Creek, Cara Blanca has very little settlement and is distant from the Belize River. The nearest secondary center to both Cara Blanca and Saturday Creek is Yalbac, and the two sites were likely linked by political associations to the royal court at Yalbac. Cara Blanca holds a unique place in the sacred geography of the southern lowlands. In Maya cosmology, openings in the earth are entrances to the underworld, symbolizing death, renewal, and purity (Brady and Ashmore 1999:127-128). These openings, whether caves or water bodies, are also sources of water integral to the lives of people. Cara Blanca consists of 25 water bodies running east-west along the base of a steep limestone cliff; *cenotes* (sinkholes) are found in the center whereas lakes are located on the eastern and western edges (Figure 3). Settlement is typically found near lakes, while *cenotes* are associated with little, if any, settlement (Lucero and Kinkella 2015). The pools form an animate landscape imbued with layers of meaning, both sacred and profane (Brady 1999). While urban Maya elites constructed temples for rituals, hinterland communities such as Cara Blanca had limited access to these built lineage mountains (Lucero and Kinkella 2015). The *cenotes* are naturally-occurring sacred spaces that would have been easily accessible to all travelers. The droughts that rocked the Maya area during the Late and Terminal Classic would have intensified the importance of water ritual and watery sacred places (Lucero et al. in press). During the Terminal Classic, the Cara Blanca pools would have been deeply important loci in the sacred landscape of central Belize.

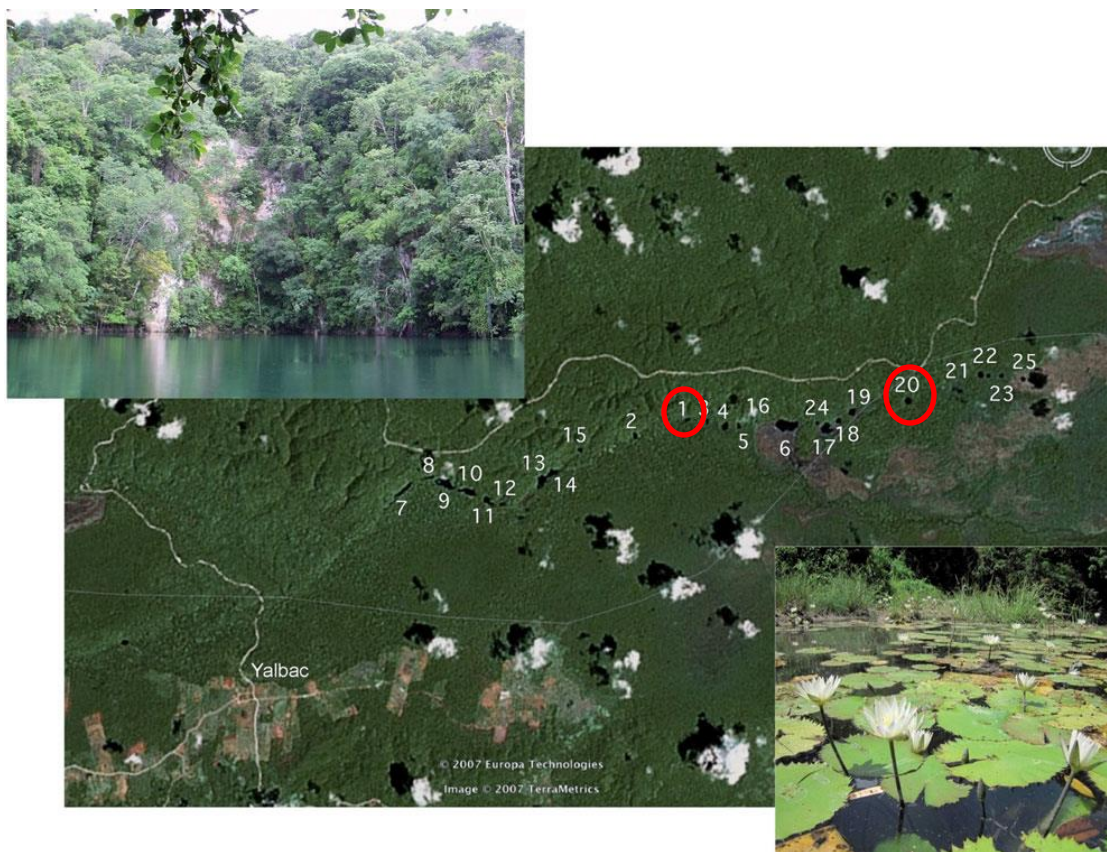


Figure 3. The Cara Blanca pools, named for the white cliff face seen at top left, are home to sacred water. Adapted from Lucero and Kinkella 2015, Figure 2.

Excavations at Cara Blanca began in 2013 and continued in 2014 (Lucero 2014, 2015). In this paper, I focus on the ceramics recovered from excavations at three sites: Cara Blanca Pool 1, Cara Blanca Pool 20, and Saturday Creek (see Figure 1). At Pool 1, I analyze Structure 1, a water temple, as well as Structure 3, a ritual platform. At Pool 20, I focus on M208, a large platform with two superstructures. At Saturday Creek, I examine four structures: two commoner houses, one elite residence, and one ritual structure. Excavations at Cara Blanca were conducted over two seasons of the VOPA project under direction of Dr. Lisa Lucero, 2013 and 2014, and I conducted the ceramic analysis for those seasons with assistance from Drs. Lisa Lucero, Eleanor Harrison-Buck, and Astrid Ringgaldier. Saturday Creek was excavated by the VOPA project in 2001, and ceramic analysis was conducted by James Conlon and Jennifer Ehret. Conlon and Ehret (2002) followed Gifford et al. (1976) in their temporal classification of Saturday Creek ceramics; however, I am revising their description of Terminal Classic Saturday Creek by incorporating Harrison-Buck's (2007) description of Terminal Classic assemblages in the Sibun Valley into the Terminal Classic assemblage described by Gifford for Barton Ramie.

Methods

Excavations at Saturday Creek were conducted in 2001 by the VOPA project. I examine the Late Classic II (700-800 C.E.) and Terminal Classic (800-900 C.E.) ceramics recovered from excavations within four different structures at Saturday Creek: SC-3, SC-18, SC-78, and SC-85

(see Figure 2). Ceramics were recovered from diverse levels in each structure. SC-18 and SC-85 are both commoner residences that were occupied from 400-1150 C.E. (Lucero 2002b:3). SC-78 is part of an elite plaza group, and was occupied from 300 B.C.E. – 1500 C.E. (Lucero 2002b:4). Finally, SC-3 is a temple that was occupied from 300 B.C.E. - 1500 C.E. (Lucero 2002b:4). These four structures provide examples from all strata of Saturday Creek society, including less affluent commoners, wealthy commoners, elites, and both residential and ritual assemblages.

The Saturday Creek ceramic assemblage was initially analyzed by Jennifer Ehret and James Conlon in 2001 as part of the VOPA 2001 project directed by Dr. Lisa Lucero. I rely on Conlon and Ehret's (2002) report chapter as well as the raw data from their ceramic analysis that is housed in both electronic and paper formats in Dr. Lucero's laboratory at the University of Illinois at Urbana-Champaign. I use Conlon and Ehret (2002) when discussing ceramic chronology and the occupation of Saturday Creek, while my analysis of ceramic types, forms, orifice diameters, and function is based on Conlon and Ehret's original data from their analysis of the ceramics recovered in 2001. Conlon and Ehret include data on the type, chronology, vessel form, orifice diameter, and function of each sherd, but they classify vessel functions as either storage or cooking and distinguish the three vases recovered as having a distinct function. Serving vessels are not distinguished from storage and cooking vessels in their analysis, although vases may have been used to pour liquids.

While Conlon and Ehret followed Gifford et al. (1976) in distinguishing the Late Classic II and Terminal Classic ceramics, I include Harrison-Buck's broader definition of Terminal Classic ceramics based on her dissertation research in the Sibun Valley. Harrison-Buck (2007) found that several ceramic types typically classified as belonging to the Late Classic or Postclassic ceramic traditions in the Belize Valley are present in Terminal Classic contexts in the Sibun Valley. The impetus for re-analyzing the original ceramic catalog lies in my experience at Cara Blanca, where the Terminal Classic ceramics do not correspond with the expected types and frequencies set forth by Gifford et al. (1976). Cara Blanca's ceramics include more jars, unslipped types, non-local polychromes, and volcanic ash-tempered wares than the Spanish Lookout complex defined by Gifford et al. (1976).

Excavations at Cara Blanca spanned the 2013 and 2014 seasons and included several sites at two pools, Pool 1 and Pool 20. Ceramics included in this analysis come from test pits as well horizontal and vertical trench excavations. Artifacts recovered from each context were collected, cataloged, and analyzed separately. Three structures, Structures 1, 3, and 4, were excavated at Pool 1 (Figure 4). Excavation at Str. 4 was limited and the ceramic assemblage was too small to be particularly informative, so I do not include it in this analysis (see Harrison 2015 for a discussion of Str.4). The present analysis focuses on Pool 1 Structures 1 and 3 (Figure 7), and Pool 20 M208. For a full analysis of the 2013 and 2014 ceramics from Strs. 1, 3, and 4, see Harrison 2014, Harrison 2015, and Lucero 2014.

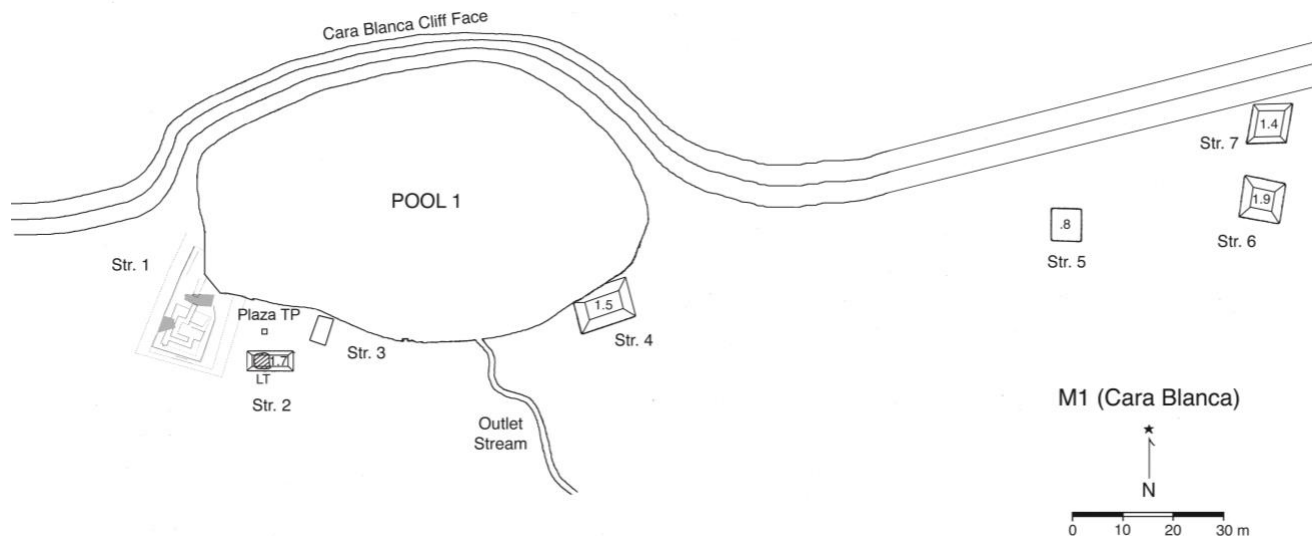


Figure 4, adapted from Kinkella 2011, Figure 5.5. Cara Blanca Pool 1 structures. Strs. 1, 3, and 4, as well as a test pit in the plaza between Str. 1 and 3 were excavated in 2014.

The construction of Pool 1 Structures 1 and 3 and Pool 20 M208 appear to have occurred at the same time. The Maya built Str. 1 in at least two phases. First the Maya built a wall and floor below the final Room 3 construction. Next, they built a floor and wall that formed the bench in Room 2. Soon after, these features were covered by the final floor surfaces. These earliest architectural features were used to contain up to 1.7 m of fill that support the second construction, and the lower floors of this earliest construction phase mirror the structure of the later construction. Although there are two distinct phases to Str. 1, both constructions date to the Late Classic II/Terminal Classic based on ceramic chronology. As discussed below, the Maya invested a great deal of time and resources in constructing Str. 1, using large quantities of high-quality plaster to build floors and finish wall faces. Although Str. 3 was not excavated below the platform surface, the small size and low height of the structure combined with ceramic chronology suggests that the platform was likely built in a single construction phase during the Late Classic II/Terminal Classic. Finally, the construction of Pool 20 M208 is a more enigmatic process. The platform and superstructures were built around a surface carved out of the limestone hillside (Nissen 2015), but the 2014 test excavations did not reveal distinct construction phases. Further excavations are needed to fully understand the construction history of M208; however, ceramic analysis suggests that this platform is largely contemporary with the Pool 1 structures.

Pool 1 Str. 1 is a 20 m x 7.5 m temple (Figure 4). During the two seasons, the crew excavated three rooms and one hallway in Str. 1, and uncovered as many as 11 strata (Harrison 2014, 2015; Lucero 2014). Excavations began with Topsoil 101, which consisted of organic topsoil and vault stone collapse from the corbel vaulted roof of the temple. Beneath the collapse, we encountered a unique, asymmetrical temple with three remaining rooms and a hallway linking the rooms along the southern edge of the temple (Figure 5). Due to collapse and looting, it was impossible to excavate the northern half of the temple, and excavation focused on the southern half of the structure.

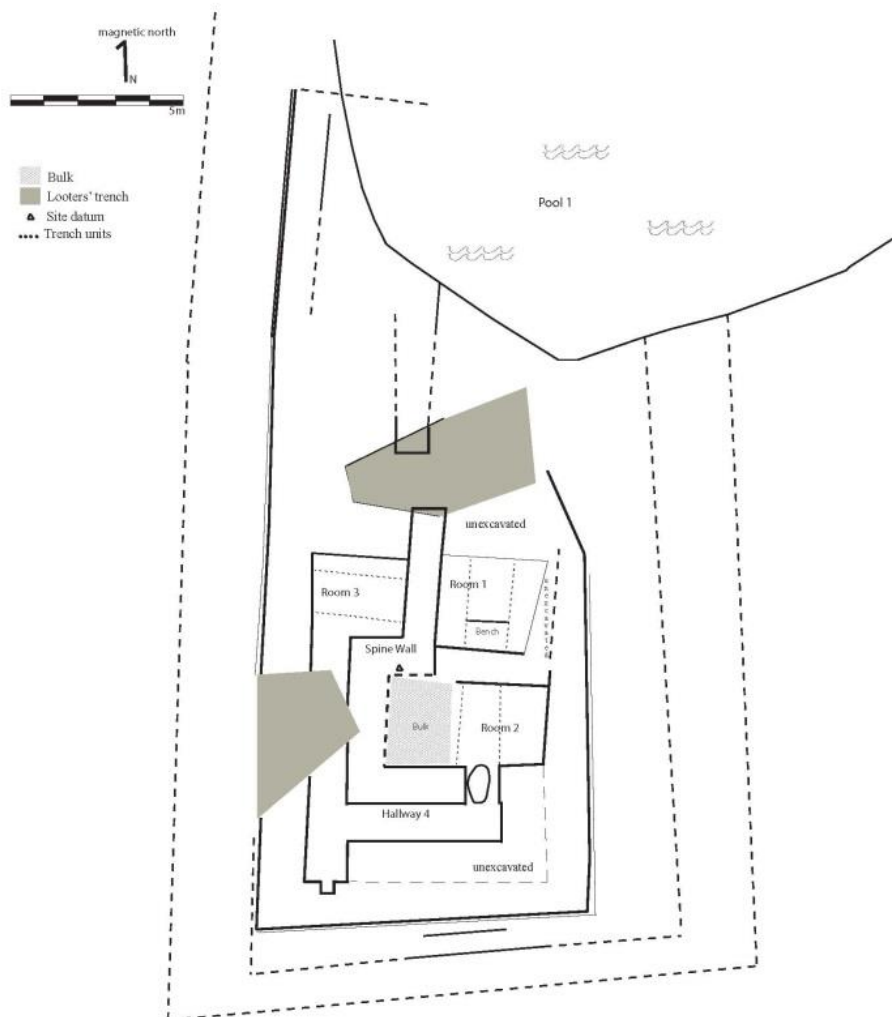


Figure 5. Plan view of Structure 1 showing Rooms 1-3, Hallway 4, and the looters' trenches. Note the proximity of the temple to Pool 1.

Structure 1 excavations found that the uppermost floors in each room were built at the same level, 2.2 m below datum, suggesting that these surfaces were in use at the same time. The quality of the building materials used in Str. 1 was exceptional. Most of the floors were 7 to 9 cm thick and made of a high-quality, fine-grained plaster over carefully prepared ballast. The one exception was Room 2 Floor 104, which was only 4 cm thick but was made with the same high quality plaster. Other Late Classic sites in the southern lowlands report average floor thicknesses of 5 cm (Hansen 1998:55; Schwake 2008:126). The investment of labor and expensive materials in this remote temple hints at the importance of this site to the Maya who built and patronized the temple.

Pool 1 Str. 3 is a 5.2 x 1.8 m platform, situated 5 meters south of Pool 1 and 20 meters to the east of Str. 1 (see Figure 4). The exact nature of the platform is unclear, but it appears to

have been used for ritual activities and there is no evidence that the platform was residential (Harrison 2015; Larmon and Nissen 2015). Larmon and Nissen (2015:70) suggest that the platform had a “prolonged and important function” related to ritual activities at Str. 1. The platform was entirely covered with a sherd blanket of 3,826 sherds (Figure 26), and the exposed platform surface was burnt. During excavation, the platform was divided into three areas: north, center, and south. While there was burning across the platform, the northern zone was most significantly burnt, even charred. Of the total sherds recovered from the sherd blanket, 158 (16.24%) were completely charred (Larmon and Nissen 2015:158). Because of this charring, many of the sherds recovered from the northern part of the platform were unidentifiable. The sherd blanket was created during the termination of Str. 3, when at least 357 vessels were placed on the platform, smashed, and burned.

Settlement at Pool 20 is comparable to the Pool 1 structures for several reasons. Along with Pools 1 and 7, Pool 20 is one of the few Cara Blanca pools associated with settlement (Kinkella 2009). Like Pool 1, Pool 20 is deep cenote 100 m in diameter, and would have been an important location in the sacred landscape of the ancient Maya (Nissen 2015:76). Pool 20 excavations were carried out in 2014, and focused on M208, a platform group located 40 m north of the pool. Pool 20 M208 is a 38 m x 26 m platform 2 m tall with two superstructures, Structures 1 and 2, that was excavated in 2014 (Figure 6). Excavations at this mound group were exploratory and limited, so this analysis considers the M208 ceramics together rather than separating the platform, Str. 1, and Str. 2 ceramic assemblages. Str. 1 is a particularly interesting construction because it was built into the hill. While the Maya built retaining walls on the eastern and western edges of Str. 1, they did not build a northern or southern wall. Instead, Str. 1 is built into the natural hillside with little apparent construction fill (Nissen 2015).

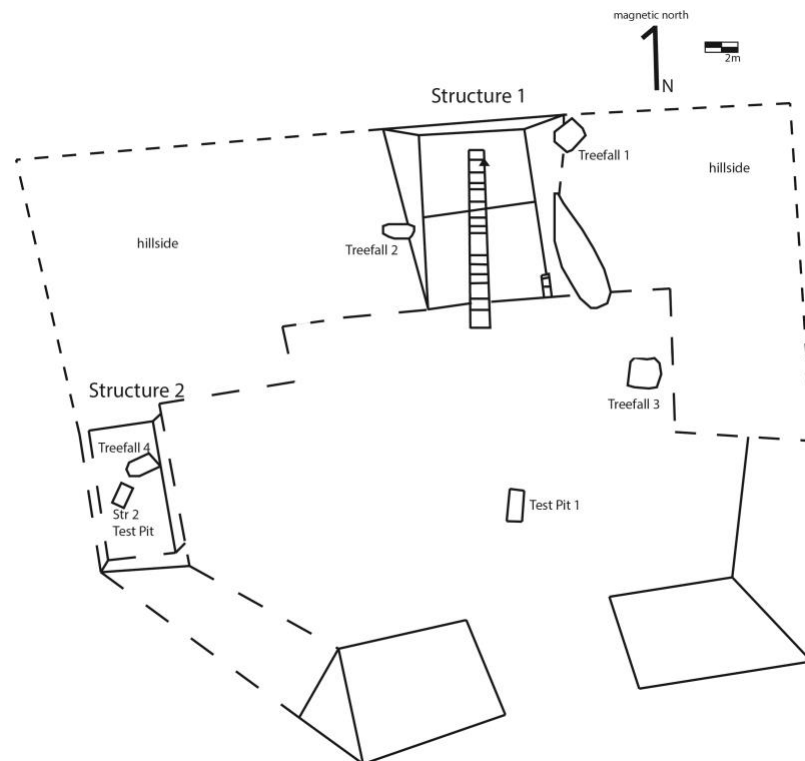


Figure 6. Plan view of Pool 20 M208 mound group showing test pits and trenches on plaza and Strs. 1 and 2.

This ceramic analysis examines three traits of the Saturday Creek and Cara Blanca ceramic assemblages: vessel form, rim and neck orifice diameters, and ceramic type. Vessel form was determined by rim orientation. Rims were classified as jars, bowls, dishes, plates, or vases. Orifice diameter of both rim and neck sherds was determined using an orifice diameter board. Orifice measurements were taken at the opening of the exterior of the rim, or just below the rim of jars with everted lips. Neck orifice diameters, which were only taken in 2014, were taken at the narrowest point of the neck. Orifice diameter measurements were taken on all diagnostic rim and neck sherds that were large enough to be measured; many of the sherds were too fragmented to be measured with any accuracy and are not included in this analysis.

Ceramic type analysis was conducted according to the type-variety system developed for Classic Maya pottery from central Belize by Thompson (1939) and Gifford et al. (1976), and revised by Harrison-Buck (2007), LeCount (1996), and Mock (1994). Ceramic type was determined according to temper and paste and slip color, as well as vessel form. Because of the high amount of volcanic ash used in the Cara Blanca Pool 1 ceramics, the temper of these ceramics did not always correspond to the expected production techniques; however, slip and paste colors did conform with the type definitions.

Analysis

This ceramic analysis begins with the Saturday Creek ceramics. Next, I introduce the Cara Blanca Pool 1 ceramics, presenting first Str. 1, then Str. 3. Finally, I present the Cara Blanca Pool 20 ceramics.

Saturday Creek Ceramics

The Saturday Creek vessels occur in five forms: jars, bowls, plates, dishes, and vases. Analyzing the vessel form distribution of the Saturday Creek assemblage reveals that it is quite distinct from the Cara Blanca assemblages. A total of 647 vessels were classified by vessel form: 35% dishes, 32% bowls, 32% jars, 0.5% plates, and 0.5% vases (Figure 7). Jars are typically used for storage and cooking, while bowls, dishes, and plates are serving vessels. Vases are rare and tend to serve a special function and may be associated with elite food consumption (LeCount 1996:275). As I will discuss later, these vessel form frequencies are quite different from the vessel form distributions at Cara Blanca.

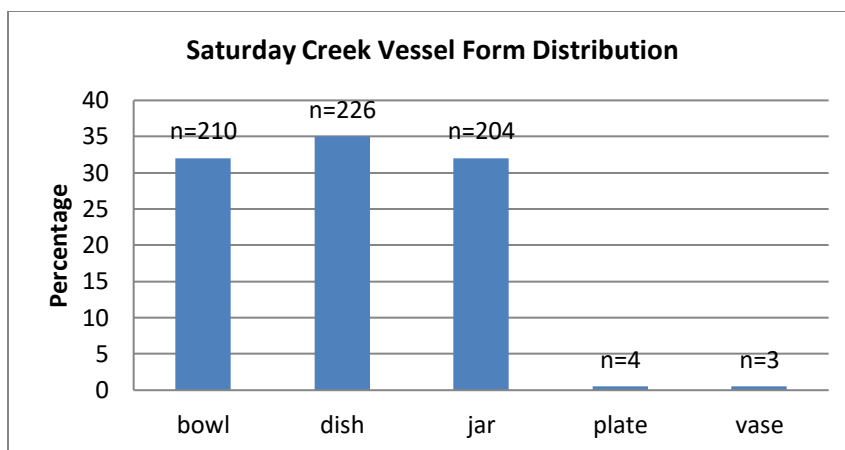


Figure 7. Saturday Creek vessel form frequencies

As well as analyzing the difference in type percentages, it is also useful to examine the range of orifice diameters for each assemblage. Orifice diameter is defined as the diameter of the opening at the exterior of the rim, or just below the rim in the case of jars with everted lips. This measurement allows for consistency between the analysis of the Cara Blanca ceramics and Conlon and Ehret's 2001 Saturday Creek data set. Orifice diameter measurements are important as they indicate the function of a vessel. Narrow-orifice jars tend to be used for liquid storage, while wide-orifice jars are used for cooking and dry storage (LeCount 1996:245). The size of serving vessels such as plates, bowls, and dishes reflects the size of the social group being served (Mills 2007). Larger vessels are typically assumed to have been used for gatherings such as feasts, while smaller serving vessels are assumed to have been used for smaller, more intimate meals. The average orifice diameters of the Saturday Creek vessels are seen in Figure 8. Although plates are the least common vessel form, they are the largest vessels, with an average orifice diameter of 33.5 cm. Dishes are the most common vessels and have the second largest orifice diameter, 28.9 cm. Bowls have a 26.1 cm average orifice diameter and jars have a 24.1 cm average. Vases are the smallest vessels with an average diameter of 16.3 cm.

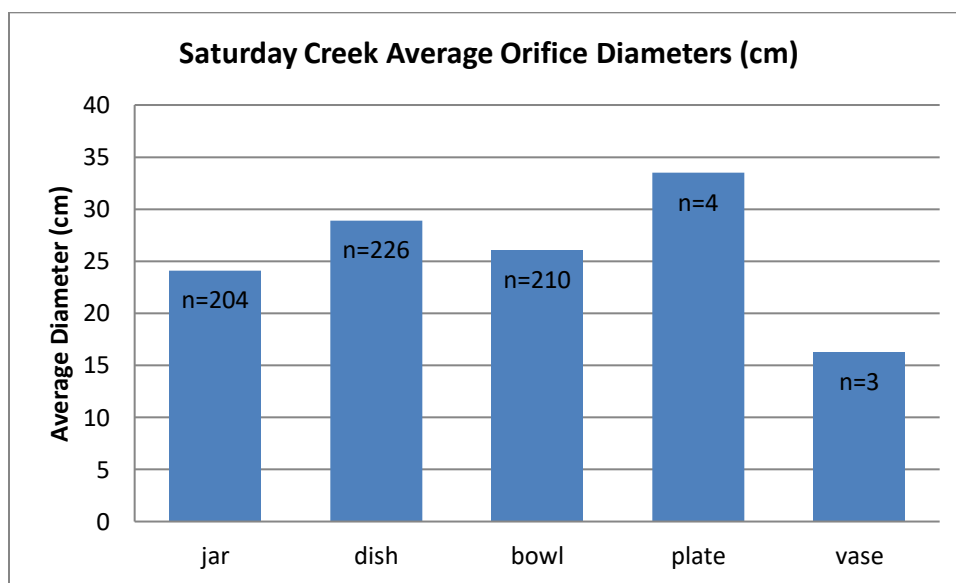


Figure 8. Saturday Creek average vessel orifice diameters.

Finally, an analysis of ceramic types and ceramic type frequencies speaks to both the chronology of a site and the interactions between people living at the site and other communities. Analysis includes several types that were previously classified as Late Classic (Mountain Pine Red group), Postclassic (Daylight Orange group), or simply not defined by Gifford (Sibun Red Neck, Runaway Creek Red-Lipped, Fat Polychrome, and Indian Creek Polychrome). Not all of these types are present in Conlon and Ehret's ceramic catalog for Saturday Creek, as Sibun Red Neck, Fat Polychrome, Indian Creek Polychrome, and Runaway Creek Red-Lipped were defined after their 2001 analysis. Table 1 in the appendix lists the ceramic types that constitute Terminal Classic Saturday Creek. Harrison-Buck (2007) notes that including Mountain Pine Red as a Terminal Classic type is a controversial decision because the type was placed in the Late Classic by Gifford et al. (1976); however, I believe that the presence of Mountain Pine Red in Terminal Classic contexts in the Sibun Valley (Harrison-Buck 2007:272) and at Cara Blanca justifies treating the type as indistinguishable from Late Classic II and Terminal Classic contexts once it has been excavated and placed in a ceramic collection. The discovery of Mountain Pine Red in the same contexts as Terminal Classic types at Cara Blanca makes this adjustment to Conlon and Ehret's chronology necessary.

A total of 30 ceramic types are included in my revised catalog Late Classic II/Terminal Classic ceramics present at Saturday Creek (Figure 9). Several of the types present at Saturday Creek are absent at Cara Blanca, while some of the Cara Blanca types are not found at Saturday Creek.

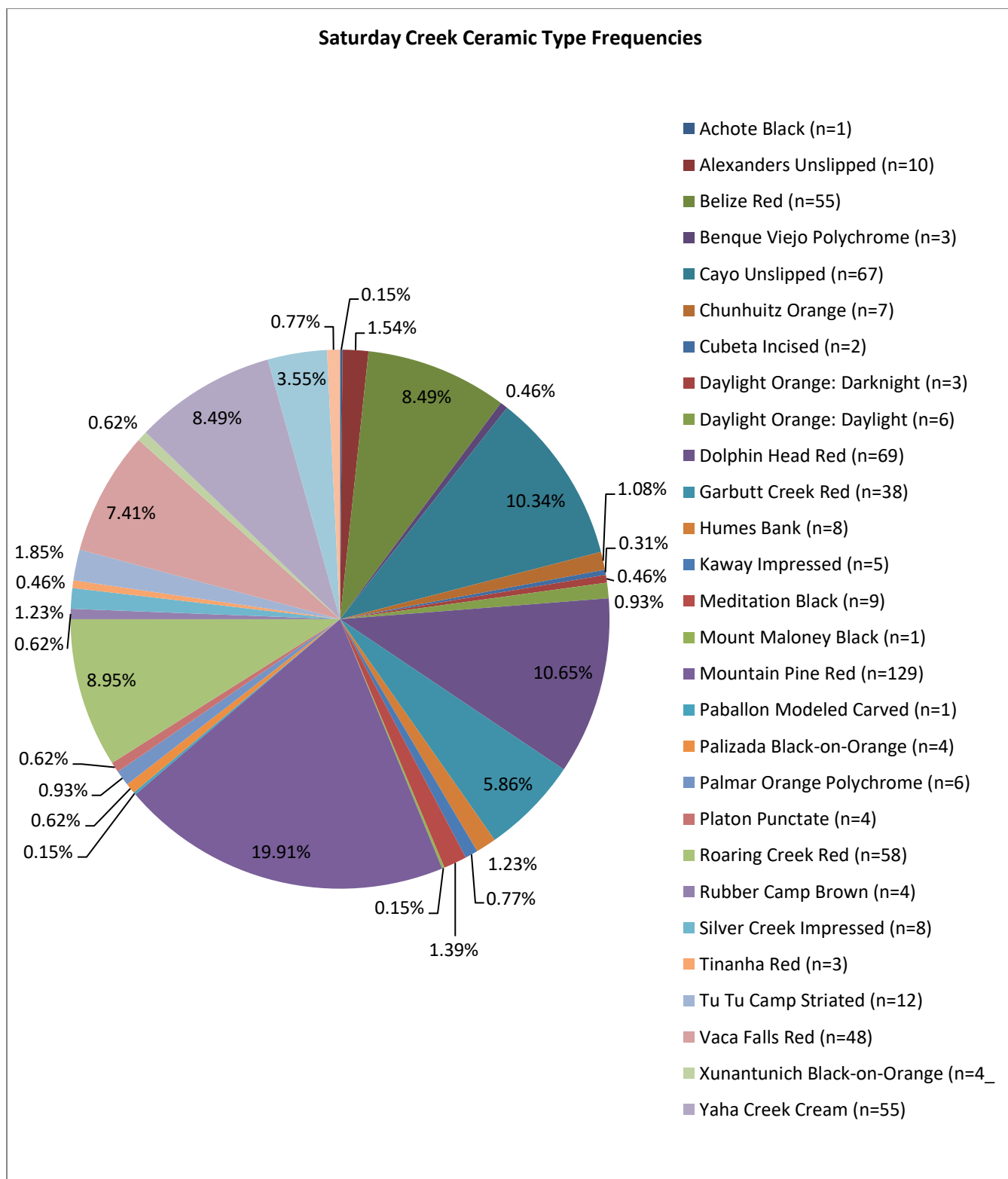


Figure 9. Late Classic II/Terminal Classic ceramic type frequencies at Saturday Creek.

In order to better understand the diversity of the Saturday Creek assemblage, it helps to distinguish between common and uncommon types. I define common types as the seven

predominant types, each of which consists of 7.0% or more of the overall assemblage. The most frequently recovered types at Saturday Creek are Mountain Pine Red (19.9% of total), Dolphin Head Red (10.7% of total), Cayo Unslipped (10.3% of total), Roaring Creek Red (8.9% of total), Belize Red (8.5% of total), Yaha Creek Cream (8.5% of total), and Vaca Falls Red (7.4% of total). Each of these types are represented primarily by a single vessel form, either dishes, jars, or bowls (Table 2). As I discuss below, this contrasts with the Cara Blanca assemblages, which are dominated by jars of a single type, either Cayo Unslipped or Sibun Red Neck.

Table 2 Common Saturday Creek Types by Vessel Form

Ceramic Type	Most Common Vessel Form	Total Vessels	Percentage of Total Vessels of this Type
Belize Red	45 dishes	n*=55	82.0% are dishes
Cayo Unslipped	67 jars	n=67	100.0% are jars
Dolphin Head Red	55 bowls	n=69	79.7% are bowls
Mountain Pine Red	104 dishes	n=129	80.6% are dishes
Roaring Creek Red	39 dishes	n=58	54.2% are dishes
Vaca Falls Red	26 jars, 18 bowls	n=48	54.2% are jars, 37.5% are bowls
Yaha Creek Cream	54 jars	n=55	98.2% are jars

*n= total vessels of a given type, based on rim sherds

The seven most common types listed in Table 1 make up almost 75% of the total assemblage. The list of common types is dominated by red-slipped wares, with one cream-slipped and one unslipped type. Mountain Pine Red, Dolphin Head Red, Cayo Unslipped, Roaring Creek Red, Belize Red, Yaha Creek Cream, and Vaca Falls Red account for 74.2% of the Terminal Classic ceramics. Garbutt Creek Red accounts for another 5.9% of the total. The remaining 23 types represented in Saturday Creek's Terminal Classic assemblage each account for less than 4% of the total vessels recovered (see appendix, Table 2). Black-slipped wares are particularly scarce at Saturday Creek, with Achote Black, Meditation Black, and Mount Maloney Black combined accounting for only 1.8% of the vessels recovered. Saturday Creek also has a wider variety of polychrome types that are present in the Late Classic II/Terminal Classic assemblage than Cara Blanca.

Saturday Creek was an enduring farming community located in the fertile Belize Valley. As a minor center, Saturday Creek had no kings yet was tied into economic and social networks that extended throughout central Belize and the eastern lowlands. The Saturday Creek community thrived during the Terminal Classic, although it was doubtless impacted by the environmental and social instability that shook the Maya lowlands. The ceramic assemblage of Saturday Creek differs from the Cara Blanca ceramics in several significant ways, most notably in the distribution of vessel form frequencies and ceramic types. The vessel form frequencies are similar to the expected domestic assemblage, in contrast with the ritual assemblages of Cara Blanca. The ceramic types found in the Saturday Creek assemblage are diverse, with a total of 30 ceramic types identified during the Late Classic II/Terminal Classic occupation. Ceramic types found at Saturday Creek are similar to those described by LeCount (1995) for Xunantunich and Gifford et al. (1976) for Barton Ramie. The similarity between Saturday Creek and Barton Ramie suggests that the two minor centers had similar ties and influences, while the similarity between Saturday Creek and the urban center Xunantunich indicates broader political linkages to

the upper Belize Valley and Petén. Interestingly, the Saturday Creek ceramic assemblage differs from the Cara Blanca ceramic assemblage in important ways, discussed below.

Cara Blanca Pool 1 Ceramics

The ceramics of two ritual structures at Pool 1 are included in this analysis. Str. 1 is a temple that was built during the Late Classic II or Terminal Classic, and was abandoned during the Terminal Classic. Str. 3 is a platform associated with Str. 1, and was also used and terminated during the Terminal Classic. Four architectural spaces were excavated within Str. 1, Rooms 1, 2, and 3, and Hallway 4 (see Figure 5). The analysis of Str. 1 is structured according to each of those elements.

Structure 1: Room 1

In 2014, Structure 1 excavations focused on a vertical and horizontal exposure of each of the four rooms. All of the room excavations began with the removal of topsoil and collapsed roof vault stones, as the Maya terminated the temple by collapsing the corbel vault roof over the last construction phase (Lucero 2014:11). In Room 1, a 1 m wide north-south trench was placed through the middle of the room to excavate below Floor 102 and through the subsequent strata (Figure 10). A bench in the southern half of the room, formed by Floor 102 and Wall 105, divided the excavations into northern and southern portions of the trench and was the most significant architectural feature in the Room 1 trench. The bench rests on top of the earliest construction of Str. 1 and below the final occupation surface, Floor 102.

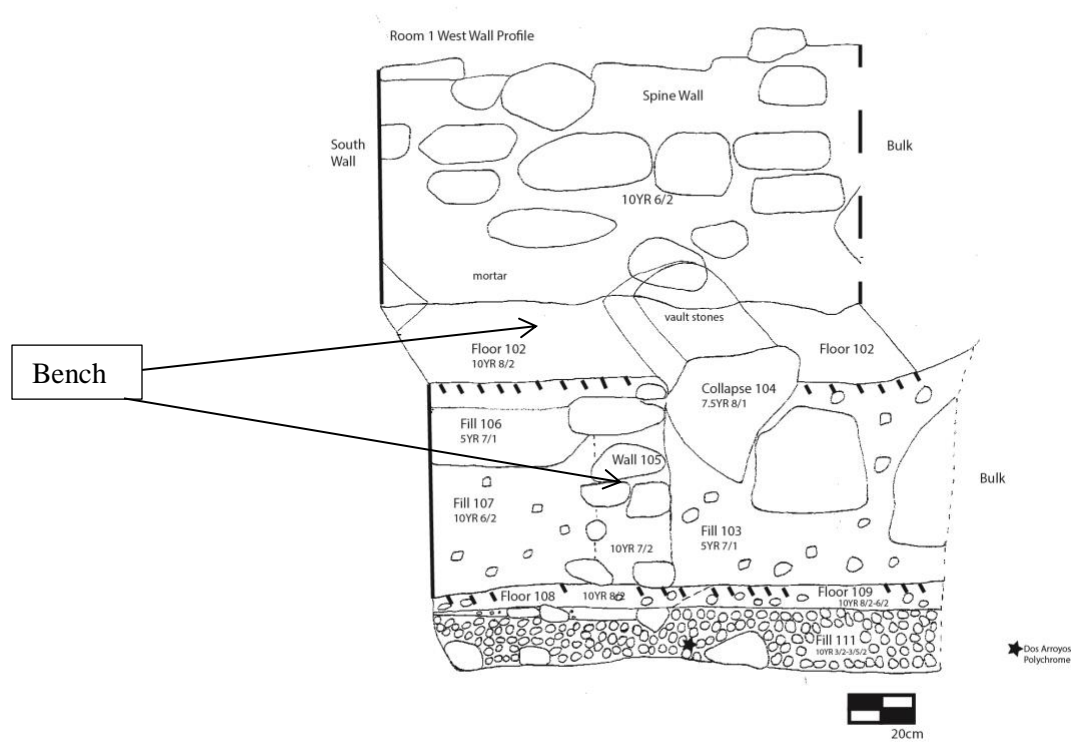


Figure 10. Room 1 west wall profile. Note the bench formed by Floor 102 and Wall 105

We initially thought that the bench was possibly an Early to Late Classic construction phase; however, further excavation revealed that both constructions date to the Late Classic II/Terminal Classic. The Maya placed a deposit of Cayo Unslipped and Alexanders Unslipped jars on top of Floor 102 as part of the termination offerings that were placed in Rooms 1, 2, 3, and Hallway 4 when the temple was abandoned. Within the bench, we excavated two fills. It is unclear why the Maya chose to use two different construction fills in the bench. The fill within the bench included both Cayo Unslipped jars and Belize Red bowls. These artifacts place the construction of the bench and the collapse above it in the same time frame, and demonstrate the short time span in which the Maya built, used, and abandoned Str. 1. Below the bench, on top of Floor 108, we found a Vaca Falls bowl base. This massive base, which likely came from a bowl some 40-50 cm in diameter, similar in size and shape to the jaguar vessel base described later, suggests that the Cara Blanca Pool 1 Structure 1 was home to large gatherings of people, as larger vessels are typically used for feasting and other social gatherings, in contrast to the smaller serving vessels typically used within the home (LeCount 2001; Mills 2007).

While the majority of the Room 1 ceramics date to the Late Classic II/Terminal Classic, a single Early Classic Dos Arroyos Polychrome vessel was found in Fill 111, below Floor 108 (see Figure 10, Figure 11). The Dos Arroyos Polychrome plate has an exterior applique button and geometric polychrome design, and links the water temple to the temporally and spatially distant Early Classic Petén where the type was likely produced (Gifford et al. 1976:173). While it is tempting to say that the plate was part of an Early Classic construction, the plate was found in the same context as Terminal Classic Cayo Unslipped jar sherds. The Maya deliberately included this Early Classic vessel in a Late Classic II/Terminal Classic construction.



Figure 11. Dos Arroyos cache plate from Room 1 Fill 111, below Floor 108

The plate is most likely an Early Classic dedicatory cache that was reaccessed and reincorporated into a new Late Classic II/Terminal Classic structure (Eleanor Harrison-Buck and Astrid Ringgaldier, personal communication 2014). The plate appeared to have a fresh break, and likely was broken during excavation. In this case, it is possible that the Dos Arroyos plate was interred intact, and that the remainder of the plate was in the unexcavated construction fill.

Structure 1: Room 2

Room 2 excavations also proceeded with a 1 m wide trench running north-south through the center of the room, in line with the Room 1 trench. The trench was excavated through Floor 104 and through the construction fills below to sterile soil (Figure 12). Excavations revealed a series of ceramic clusters that was found placed on top of Floor 104, at the base of the room dividing wall on the northern edge of Room 2, discussed below. In the doorjamb between Room 2 and Hallway 4, we found a shaped, plastered stone we dubbed the ‘stela stone’ (Figure 18, below).

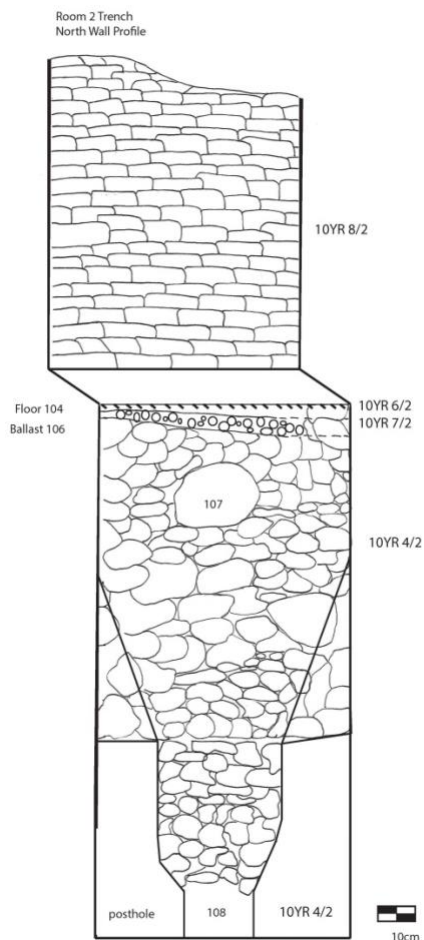


Figure 12. Room 2 Trench North Profile. The boulder in Fill 107 is visible in the center of Fill 107, below Fl. 104.

Although the construction fill throughout the rest of Str. 1 consisted of monochromatic gray material, the lowest fill of Room 2, Fill 107, was strikingly red. As previously suggested,

the lithic and ceramic components of the fill appear to have been chosen for their color (Harrison 2014). Construction Fill 107 had very few ceramics, but the pottery we found were almost exclusively red (Figure 13). While red-slipped ceramics are an important part of the overall Cara Blanca assemblage, no other stratum drew our attention for its monochromatic quality. Cayo Unslipped jars were present in every context of Room 2 except for Construction Fill 107, which had very few ceramics. Those sherds we did recover were from Roaring Creek Red and Dolphin Head Red vessels, rather than the usual unslipped jars. The red color of Construction Fill 107 was interesting for several reasons. While Cara Blanca is notable for the nearly complete lack of the black slipped wares typical of the Terminal Classic, the artifacts included in Fill 107 seemed to have been intentionally selected for their red color, which matches the preferred red slip color.



Figure 13. Room 2 Trench Fill 107 red rims (left) and lithics (right). Types include Dolphin Head Red, Roaring Creek Red, and Sibun Red Neck. Note the similarity in color between ceramics and lithics.

Additional excavations included a test pit in the north east armature of Room 2 with the intention of uncovering the east wall. Although the east wall was not found, this test revealed a much lower wall that was similar in height to the veranda wall on the exterior of Hallway 4 and Room 3. A Palmar Orange polychrome bowl rim was found in the wall armature (Figure 14).



Figure 14. Palmar Orange polychrome from Room 2 NE armature

Two test tunnels were put into the unexcavated bulk to the west of the Room 2 trench. These tunnels were placed on the northern and southern edges of the trench, just above Floor 104. In the north tunnel, two Terminal Classic clusters were found at the base of the spine wall, in line with the four ceramic clusters we encountered in 2013 (Figure 15, Figure 19 below). The northern cluster included at least two Cayo Unslipped jar rims, one of which was inverted.



Figure 15. Left: Cayo Unslipped jar cluster from North Tunnel. Right: North Tunnel at northwest corner of Room 2

This cluster is likely a part of the 2013 Cayo Unslipped jar cluster that was not exposed in the previous season (see Harrison 2014). The north tunnel cluster raises an intriguing question: does the line of clusters extend the entire length of the northern wall of Room 2? If so, was Room 2 a focus of ritual activity during the termination of the temple? Are the Room 2 clusters and the Str. 3 sherd blanket (see below) part of the same termination event or were Strs. 1 and 3 terminated in separate events? The southern tunnel also included a cluster that contained another Cayo Unslipped jar.

Structure 1: Room 3

A Palmar Orange Polychrome rim found in the collapse and Belize Red rims found on top of Fl. 102 date this collapsed material to the Late Classic II or Terminal Classic. The vault stones included in the collapse seemed to be almost intentionally placed, further supporting the interpretation that Str. 1 was ritually de-animated. A single ceramic cluster was placed on top of Floor 102 in the northeast corner of the room. This cluster consisted of an incomplete Belize Red plate (Figure 16).



Figure 16. Belize Red plate rims from the top of Room 3 Floor 102

Floor 102 is the same floor found in Hallway 4 Floor 102 (see below), although the floors are separated by a looters trench. Once Floor 102 was fully exposed, Room 3 excavations focused on a 1 m trench running east-west through the center of the room. The Room 3 trench was perpendicular to both the spine wall and the Room 1 trench, and exposed the earliest construction phase of Str. 1 (Figure 17 a, b).

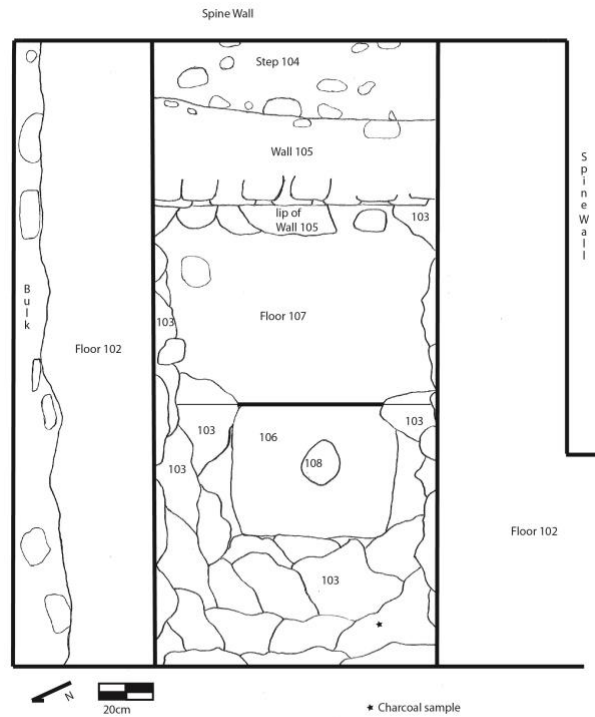


Figure 17a Room 3 Plan view, Wall 105 is the earlier construction



Figure 17b Left: Room 3 Trench. The earlier construction is visible below the spine wall.

Directly beneath the spine wall, a 7 cm thick plaster surface (Step 104) was laid on top of a 1.15 m tall wall, Wall 105. The wall ran north-south and was in-line with the spine wall between Rooms 1 and 3. Wall 105 was made of rectangular limestone blocks faced with a thin layer of plaster. A plaster floor of unknown thickness extended to the west at the base of Wall 105, and abutted sterile topsoil.

Although Wall 105 was built before the spine wall, it appears to be a late construction (Brett Houk, personal communication, 2014). This wall was briefly excavated during the last day of the 2014 season, but the only artifacts recovered were 5 unslipped body sherds that could not be identified to provide a relative chronology for Wall 105. The wall seems to be associated with the bench found in Room 1, which dates to the Late Classic II/Terminal Classic, but the five body sherds that were removed from the wall are unidentifiable and there is no certainty about the chronology of Wall 105. The relationship between the wall and the Room 1 bench also remains unclear, as the floor below Wall 105 is 1.35 m lower below datum than Room 2 Floor 108, the lowest floor in Room 2.

The remainder of the trench revealed two layers of construction fill below Floor 102. Directly below Floor 102 was Fill 103, a 1.10 m thick layer of cobbles and tufa. Fill 103 was significant for two reasons: one, while tufa is common in the collapsed roof material, the Maya do not use it as fill in other contexts (Lucero 2014); and second, there were significant areas of burning in Fill 103. All of the ceramics recovered from Fill 103 were jars, including Terminal Classic Cayo Unslipped and Sibun Red Neck, and Late Classic II/Terminal Classic Cayo Unslipped, Alexanders Unslipped, and Tu-tu Camp Striated. One of the Cayo Unslipped jar necks had nail incisions, which is unusual although Gifford describes such decoration on a single vessel of Cayo Unslipped: Variety Unspecified (Buff) (Gifford et al. 1976:279). While there were slipped body sherds, no slipped diagnostics were found in this fill. Below Fill 103 and above Floor 107 and Fill 108 was a second layer of darker clay loam construction fill. Fill 106 was an additional 3.33 m deep, and contained little tufa, although a few pieces of burnt tufa were recovered near the top of Fill 106. Ceramic chronology places Fill 106 in the Terminal Classic, although some Late Classic II vessels, including Cayo Unslipped, Alexanders Unslipped and Sibun Red Neck jars, as well as Vaca Falls Red dishes were recovered.

Structure 1: Hallway 4

Over the course of two seasons, a total of two strata were excavated in Hallway 4-Topsoil 101 and Floor 102. Horizontal excavation followed Floor 102 across the extent of Hallway 4, looking for doorways in an attempt to understand the relationship between Rooms 2 and 3 to the north. Hallway 4 is a narrow hallway leading from Room 2 to Room 3 along the southern edge of the temple. The hallway was built to both direct movement and confine sight, as there was only one doorway into the hallway in the southwest corner, and the hallway funneled people to Room 2 or Room 3. People who enter the narrow (~1 m wide) passage may move along the southern edge of the building, passing from Room 2 to Room 3 or vice versa. Within the hall, an individual's ability to see, and hear, would be restricted to glimpses and echoes at either end of the passageway. Near the southwest corner, the wall height drops from 2.36 mbd to 2.42 mbd. The lower wall probably continues the entire length of the western side, and may have served as a veranda or porch.

Topsoil 101 was the same as the collapse covering all of Str. 1, while Floor 102 was the same as Room 3 Floor 102. Although we did not excavate through Floor 102 in Hallway 4, it appears to be the same 9 cm thick surface. Hallway connects Room 2 and Room 3 along the southern edge of the temple, although the juncture between Room 3 and Hallway 4 was destroyed by a looter's trench, which likely destroyed the entrance into the hallway. The doorway between Room 2 and Hallway 4 was marked with an undecorated stela shaped limestone block, dubbed the 'stela step' (Figure 18). Tucked between the stela step and the doorframe were several Cayo Unslipped jar necks dating to the Terminal Classic.



Figure 18. Drone shot by Tony Rath of Hallway 4, showing the step in the southwest corner of the hallway and connection to Rooms 2 and 3. A large, carved stone ‘stela step’ marks the doorway between Room 2 and Hallway 4.

The most common artifacts recovered from Hallway 4 were Cayo Unslipped and Vaca Falls Red vessels, mostly large unslipped jars with narrow orifices. Topsoil 101 included several small lithics, such as blue chert chunks and a single piece of burnt chert. We also found what seemed like a possible speleothem but turned out to be a different calcium carbonate formation. Perhaps the Maya, too, were struck by its resemblance to cave formations. In this case, it could have carried many of the same associations as speleothems and further connected the temple to the sacred pool. Regardless, the formation was surely charged with the same significance as the tufa that was placed on the temple’s surface (Lucero 2014). Sibun Red Neck jars date the collapse to the Terminal Classic, and a mix of Cayo Unslipped, Tu-tu Camp Striated, and Palmar Orange vessels were also included in the topsoil. We also came upon four ceramic clusters, named A, B, C, and D, which are discussed below.

Structure 1 Clusters

The Str. 1 excavations revealed a series of ceramic clusters placed at key locations of the temple. A line of four clusters was found at the northern edge of Room 2, running east-west at the base of the wall dividing Rooms 1 and 2, with a fifth cluster placed in the southeast corner of Room 2 near the doorway to Hallway 4 (Figures 19 and 20) (Harrison 2015; Lucero 2014). Cluster 1 included an inverted Cayo Unslipped jar rim and neck and a Dolphin Head Red: Silver

Creek Impressed dish with a stick impressed design on the basal break. Cluster 2 included Cayo Unslipped jar rims and some Vaca Falls Red rim sherds. Cluster 3 contained a Vaca Falls Red bowl rim and Fat Polychrome 'jaguar vessel' bowl rim and body sherds. Cluster 4 consisted of an unslipped dish rim and body sherds of an unknown type. Cluster 5 included unslipped body sherds from a large jar, likely Cayo Unslipped. Cayo Unslipped rim sherds were found nearby tucked around the limestone slab step in the doorway to Hallway 4.

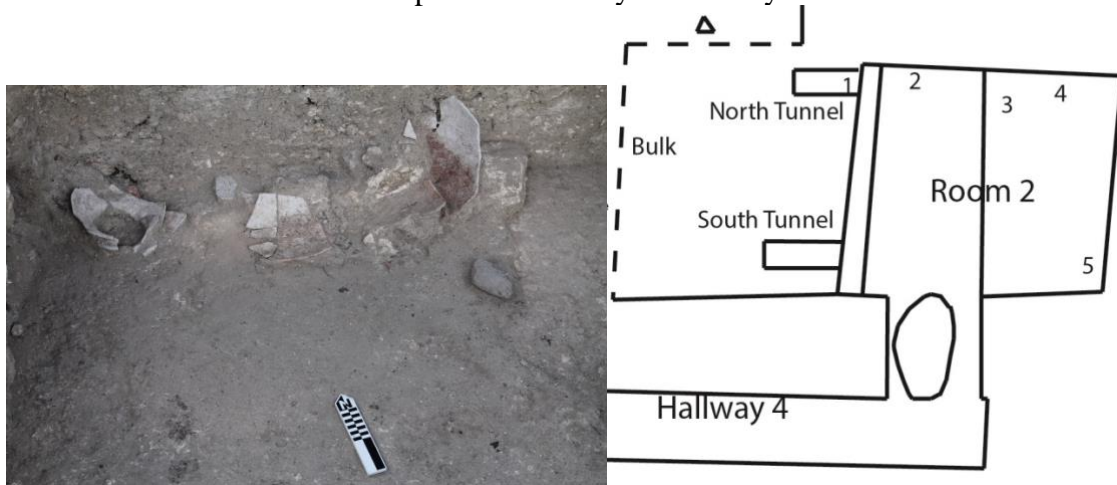


Figure 19 Left: Room 2 Clusters 1, 2, and 3 in situ. Right: Str. 1 plan view showing locations of Clusters 1-5



Figure 20. Room 2 Clusters. Top left: Cluster 1 Silver Creek Impressed, Center: Cayo Unslipped from Cluster 1-2. Right: Vaca Falls Red. Bottom left: Fat Polychrome. Center: Unknown unslipped. Right: Cayo Unslipped.

Four additional clusters, named A, B, C, and D were found in Hallway 4, in the southwest corner of the passage near what may have been an entry (Figure 21 and 22). Cluster A included two nearly complete Cayo Unslipped jars, one of which was inverted, and one Belize Red bowl. Cluster B included Fat Polychrome body sherds from the jaguar vessel that was also found as part of Room 2 Cluster 3. Cluster C was the base of the Fat Polychrome jaguar vessel, although it did not refit to the reconstructed body and rim sherds. Finally, Cluster D consisted of a partial narrow orifice Cayo Unslipped jar.



Figure 21. Clockwise: Hallway 4 Clusters A, B, C, and D. A and D are Cayo Unslipped jars, B and C are the Fat Polychrome jaguar vessel.



Figure 22. Hallway 4 clusters in situ in southwest corner of the passage.

Interestingly, no clusters were recovered from the center of the room. The clusters seem to be marking the cardinal directions north and south the way that the Hallway 4 clusters mark the southern edge of the hall. These clusters were mostly composed of rim and neck sherds, and no whole or completely reconstructable vessels were found. Termination rituals often include the placement of large rim fragments on and around important parts of a structure, such as the Castillo at Xunantunich (LeCount 1996:254). At Cara Blanca, these termination deposits contain mixed vessels, and fragments of a single vessel are intentionally placed in different areas of the temple. The most striking example of this is the jaguar vessel, which was initially found in Room 2 Cluster 3, along with a Vaca Falls Red bowl. In 2014, more pieces of the jaguar vessel were recovered in Hallway 4 Clusters B and C, described above.

Structure 1 Jaguar Vessel

The jaguar vessel is the most significant artifact recovered from Cara Blanca. The vessel is a massive Fat Polychrome bowl with a 45 cm rim diameter. A jaguar is depicted on the front and back of the bowl, with a band of glyphs below the rim and parallel wavy line motifs in the middle running vertically to the rim (Figure 23). Epigrapher Joanne Baron interprets the band as a sky band with celestial references to darkness and the color yellow/preciousness (Lucero 2013:18). She suggests that the parallel lines are part of an eroded water band, and that the jaguar and water motifs together represent Cara Blanca (Lucero 2013:18). The jaguar itself is stylistically different from Late Classic motifs of the southern lowlands. The jaguar appears “crude” and draws on a style more common to the northern lowlands (Eleanor Harrison-Buck, personal communication, 2013).

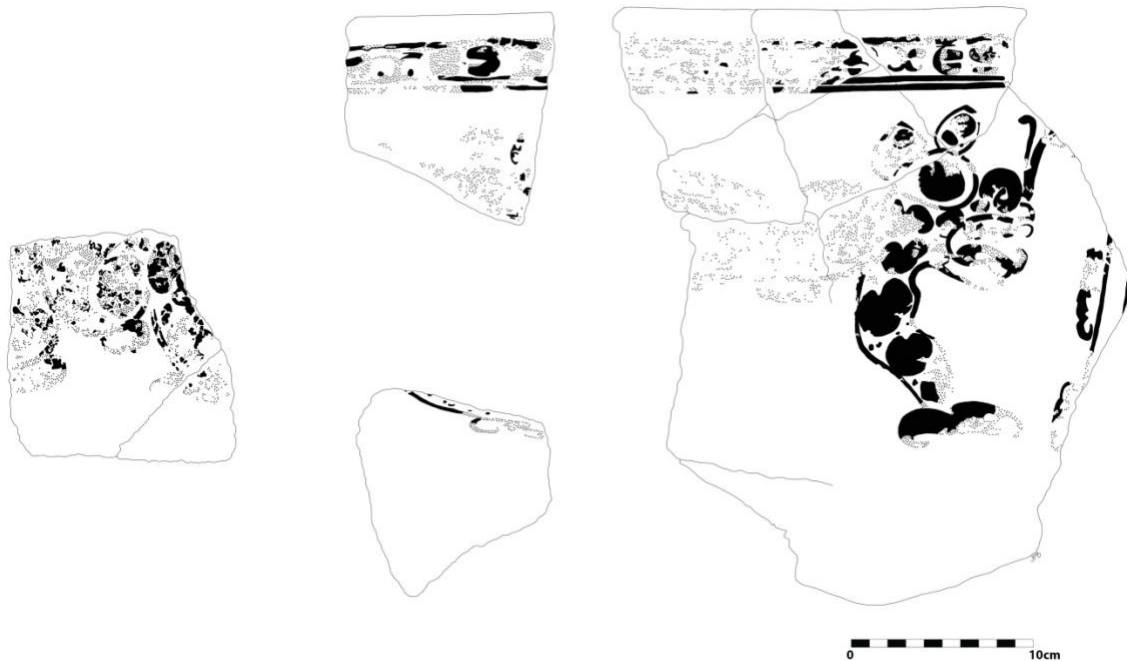


Figure 23. Joanne Baron’s drawing of the jaguar vessel, showing the head and forelimb of one jaguar and torso of a second jaguar on the opposite side. The rim of the vessel is decorated with celestial iconography. Note the water band on the center and far right body sherds.

The Fat Polychrome and crude jaguar design reflect a northern influence at Cara Blanca, whether the vessel was brought by travelers or comes from northern Belize (Harrison-Buck 2007:244). The jaguar vessel was intentionally distributed between Room 2 and Hallway 4, and placed in the two areas of Str. 1 that have the most ceramic offerings.

Analysis of Structure 1 Ceramics

A total of 355 vessels, as identified by diagnostic rim sherds, were recovered in 2013 and 2014 and classified by vessel form (Figure 24). The Str. 1 ceramic assemblage is composed of 72.1% jars, 16.9% bowls, 6.48% plates, and 4.51% dishes. Compared to the Saturday Creek assemblage, which has almost equal numbers of dishes, bowls, and jars, the Cara Blanca ceramic assemblage is clearly not residential. In fact, the vessel counts and sizes are quite different from what we would expect in a typical central Belizean Classic Period household (Lucero 2001:15). The relatively-wide orifice of the jars suggests that they were used for storage; further, there is no evidence that the vessels were used for cooking. The lack of charring or visible food residues suggests that these jars were primarily used to store water, perhaps for use in water-related ceremonies in the temple. Although there is no clear evidence of cooking, the large rim diameter of most of the plates, bowls, and dishes indicates that these vessels were used to serve large numbers of people. Food used in public rituals was likely prepared near the temple, however, the lack of evidence for a hearth and relative absence of cooking vessels indicates that cooking was not a common activity at Str. 1. As I discuss below, Conlon and Ehret (2002) suggest that a significant percentage of the Saturday Creek vessels were used for food preparation.

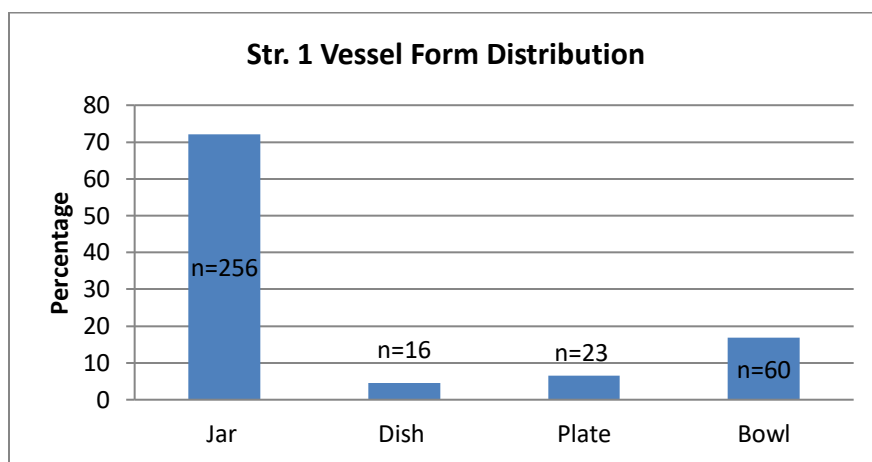


Figure 24 Str. 1 Vessel Form Distribution (n=355)

Orifice diameters were taken on a total of 225 rims and necks recovered from Str. 1 (Figure 25). The jar rims have an average orifice diameter of 19.3 cm, jar necks have an average diameter of 25 cm, dishes 40.3 cm, plates 35.7 cm, and bowls 29.8 cm. The dishes, plates, and bowls are suitable for serving large groups of people. The large-bodied jars have wide orifices, although they are narrower than the average Saturday Creek jars. Assuming that the largest orifice jars are outliers, the Str. 1 jars are fairly standardized. Of the 73 total Cayo Unslipped jars identified, only 5 (6.85%) have orifice diameters over 25 cm. The average orifice diameter of the 68 jars that are 25 cm or smaller is 18.2 cm, while 60 Cayo Unslipped jars under 25 cm have an average diameter of 17.3 cm. This average is considerably smaller than Saturday Creek's, and approaches the 10 cm orifice diameter LeCount (1996:245) uses to defined narrow-

orifice jars. Jar necks were only measured in the 2014 season, and are not a good characteristic for comparison across sites because Conlon and Ehret did not measure the Saturday Creek necks and the Pool 20 assemblage necks were too poorly preserved to measure. In spite of this, jar neck diameters are useful measurements that help to understand the shape and size of these storage vessels.

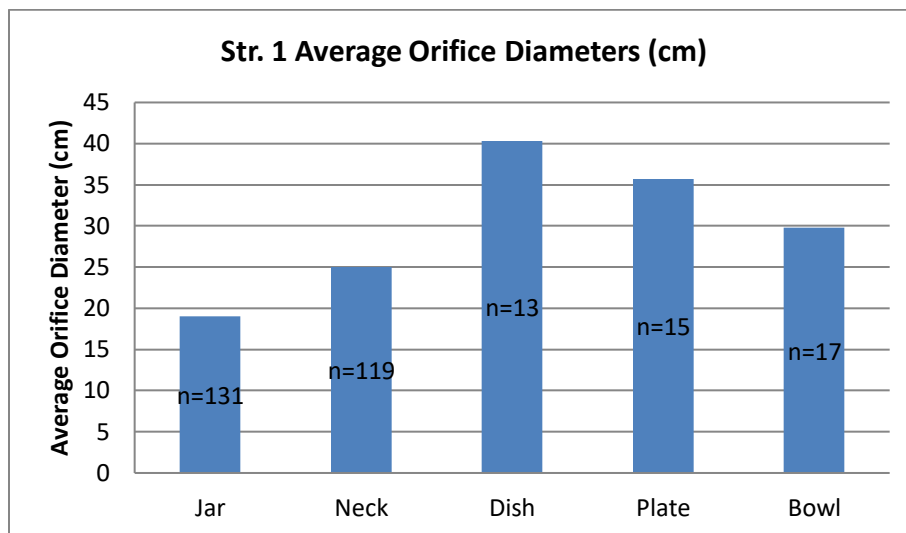


Figure 25. Str. 1 average orifice diameters (cm). Necks were not measured in 2013.

Analysis of ceramic types recovered at Pools 1 and 20 included rim and neck sherds only, as other diagnostic sherds were extremely rare and no vessels could be completely reconstructed. Str. 1 ceramics have more volcanic ash temper than we expected, often in a mixed temper of ash and calcite or grog. Volcanic ash temper is so common that even utilitarian wares typically made with calcite temper, such as Cayo Unslipped, are made with ash temper. As a result, the ceramics are relatively well preserved. Although Str. 1 had better preservation than the other Cara Blanca assemblages, many of the diagnostic sherds we recovered could not be typed due to poor preservation. Over the course of the 2013 and 2014 seasons, 260 vessels were typed and 14 types identified (Figure 26). The vast majority of the Str. 1 vessels were Cayo Unslipped jars, which account for over 75% of the assemblage. Belize Red and Sibun Red Neck are also common types, each accounting for more than 5% of the assemblage. The eleven other types recovered account for less than 5% of the total typed vessels. Of the slipped vessels, all but two are red-slipped types. Black-slipped types such as Mount Mahoney Black and Achote Black are conspicuously absent from all of the Cara Blanca excavations. While we only recovered four Vaca Falls Red bowls at Str. 1, our excavations throughout Cara Blanca are marked by the presence of a distinctive mid-break Vaca Falls Red bowl form (Ellie Harrison-Buck, personal communication, 2014).

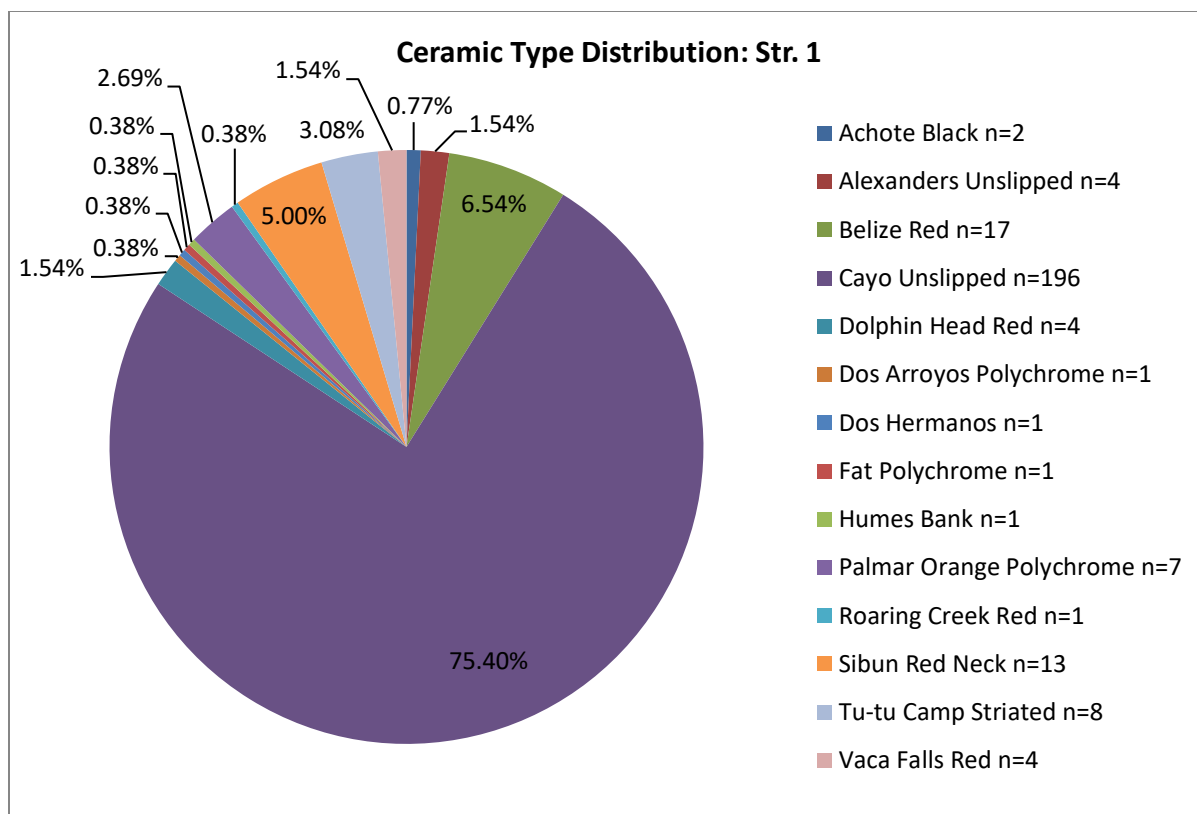


Figure 26 Str. 1 Ceramic Type Frequencies (n=260)

Cara Blanca Pool 1 Structure 3 Ceramics

Due to the quantity of ceramics recovered from Str. 3, we chose to separate the sherds by unslipped body sherds, slipped body sherds, and diagnostics. The unslipped body sherds were counted but not washed, while slipped body sherds and diagnostic sherds were washed and analyzed for ceramic type, vessel form, and orifice diameter when possible. Str. 3 was covered in a sherd blanket, the result of a termination ritual (Figure 27). Of the nearly 4,000 sherds recovered from Str. 3, we were able to type 90 sherds, classify the vessel form for 371 diagnostic sherds, and take an orifice diameter measurement on 240 rim sherds. The poor preservation and fragmentation of the Str. 3 rim and neck sherds greatly limited the number of diagnostics that could be measured for orifice diameter, while the heavy burning obscured the slip and paste colors and complicated the ceramic type analysis.

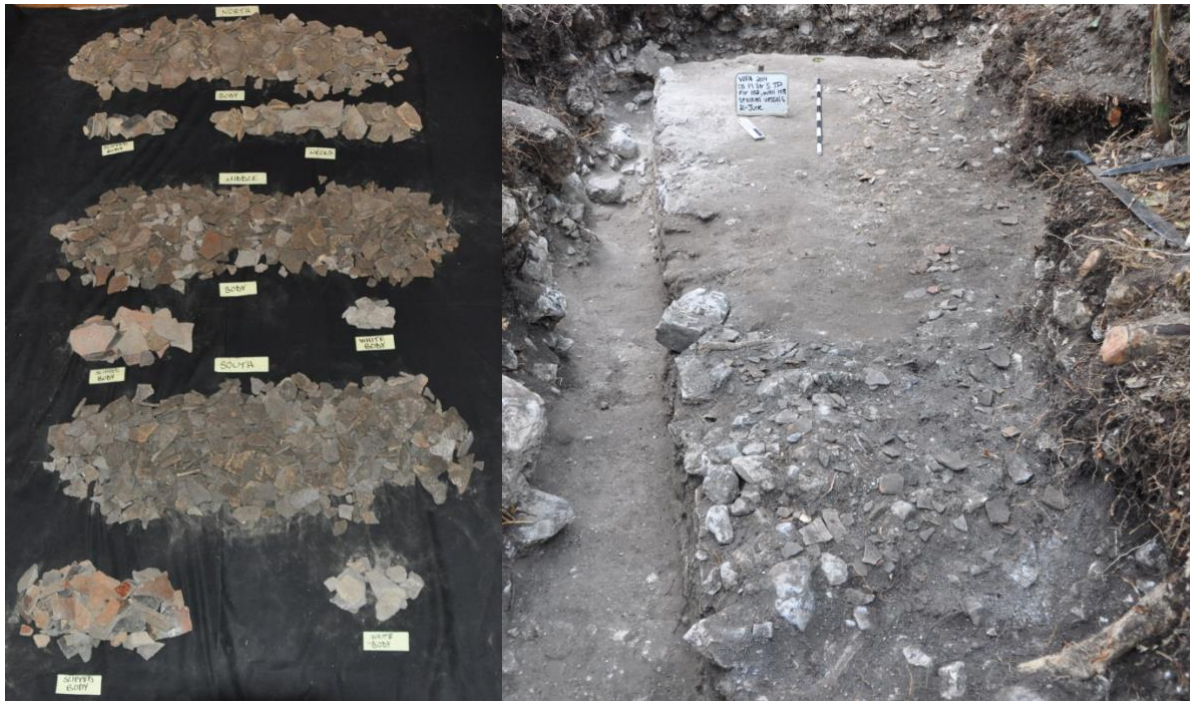


Figure 27. Left: Str. 3 sherd blanket ceramics organized according to where they were recovered (North, Center, and South). Right: Str. 3 sherd blanket in situ.

A total of 240 vessels recovered from Str. 3 were classified according to vessel form (Figure 28). The Str. 3 ceramic assemblage consisted of 70.9% jars, 15% bowls, 10.4% dishes, and 3.8% plates. The vessel form percentages are strikingly similar to those of Str. 1, suggesting that Strs. 1 and 3 served similar and interrelated purposes for the Maya who built and used these ritual structures.

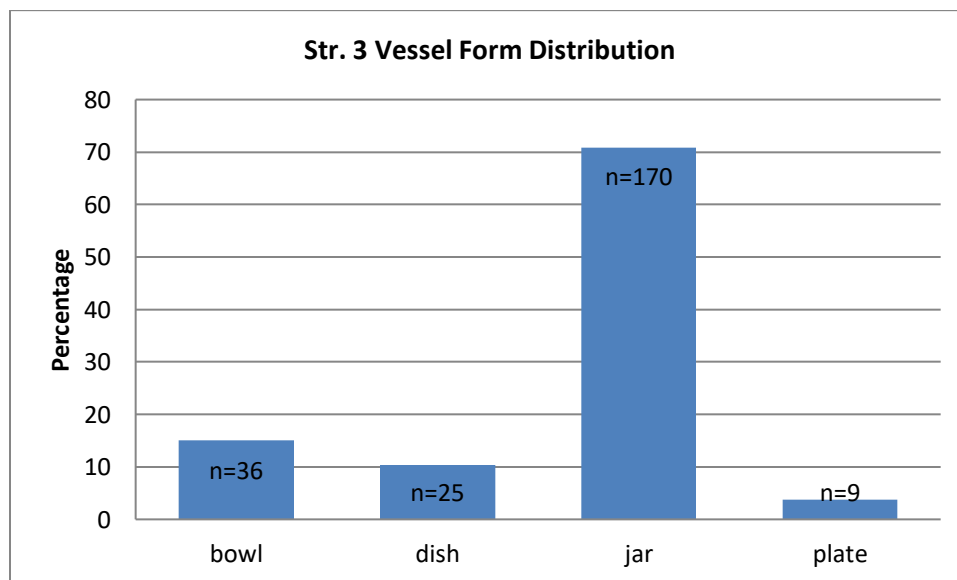


Figure 28. Str. 3 Vessel Form Distributions (n=240)

The orifice diameters of the Str. 3 ceramic assemblage resemble the Str. 1 assemblage with one exception (Figure 29). Str. 3 plates have the largest average orifice diameter, 37 cm. Dishes have an average diameter of 35 cm and bowls of 32 cm. The jar rims and necks are fairly constricted, 20 and 23 cm respectively. This is comparable to the Str. 1 jar orifices, and suggests that the Str. 3 jars were likely used for similar storage purposes. The large orifice diameter of plates, dishes, and bowls also suggests that they were used to serve large groups of people rather than smaller, more intimate groups or individuals.

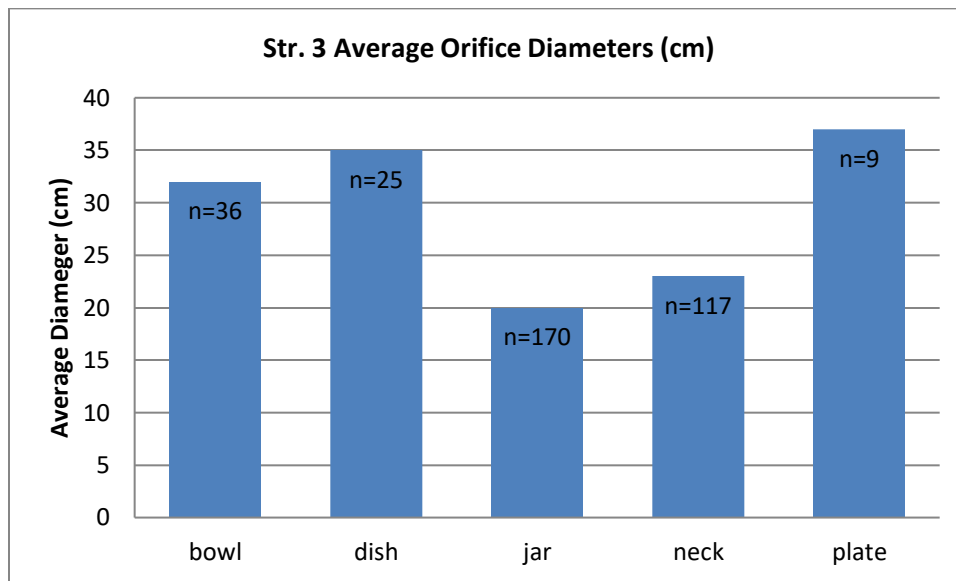


Figure 29. Str. 3 Orifice Diameters (n=357)

The identifiable ceramic types of Str. 3 are somewhat different from those found at Str. 1. Although some 3,826 sherds were recovered from Str. 3, the ceramics were heavily charred and poorly preserved compared to Str. 1, and the majority could not be identified by type. A total of 90 rim and neck sherds were typed, and seven ceramic types identified (Figure 30). Like the ceramics of Str. 1, the Str. 3 assemblage is dominated by Cayo Unslipped jars, which are 68% of the assemblage. Red slipped types compose the majority of the remaining assemblage, particularly Mountain Pine Red, which is 26% of the total. Two Chunhuitz Orange and one Achote Black rims were recovered.

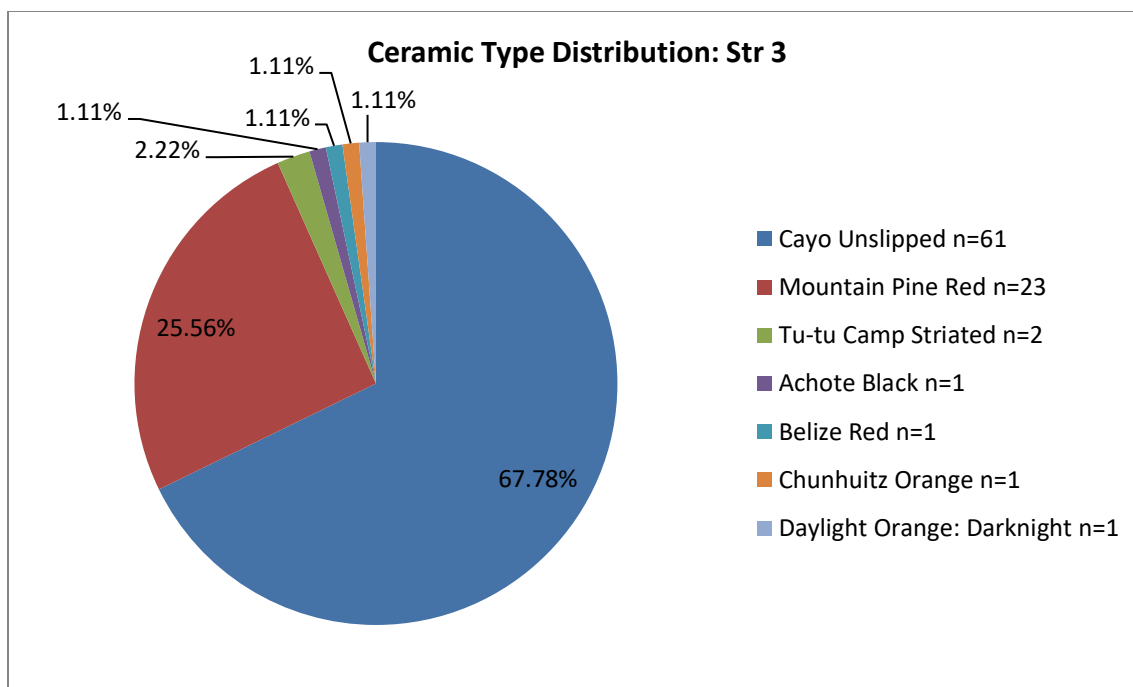


Figure 30. Str. 3 Ceramic Type Frequencies (n=90)

While Str. 1 is characterized by well-preserved volcanic ash tempered sherds, the ceramics of Str. 3 are poorly preserved, with more calcite temper. All of the types identified date to the Late Classic II/Terminal Classic, including Mountain Pine Red, Roaring Creek Red, Cayo Unslipped, Tu-tu Camp Striated, and Chunhuitz Orange sherds. While many of these types span the Late and Terminal Classic periods, the lip treatments of the Cayo Unslipped are indicative of the Terminal Classic (Gifford et al. 1976:278; Harrison-Buck 2007:232-235).

Cara Blanca Pool 20 Ceramics

The Pool 20 ceramics were extremely degraded compared to the Pool 1 Str. 1 ceramics, and different types were recovered at Pool 20. Sibun Red Neck jars, which are present but not common at Pool 1, were found throughout the Pool 20 M208 excavations. Rim sherds from either a Saxche or Palmar Orange Polychrome vessel were found in the Str. 1 trench, dating the structure to the Late to Terminal Classic. Several distinctive Terminal Classic ceramic types were recovered, including one Daylight Orange: Daylight vessel and one Indian Creek Polychrome vessel. These types place the occupation of Pool 20 M208 in the Terminal Classic, coeval with Pool 1 settlement (Figure 31). We additionally recovered a Vaca Falls dish rim that is similar to the distinctive mid-break dishes we found throughout the Pool 1 excavations.



Figure 31. Daylight Orange: Daylight and Indian Creek rims from the Pool 20 M208 trench. Note the poor preservation compared to Pool 1 ceramics.

The Pool 20 vessel form distribution is quite similar to the vessel form frequencies of the Pool 1 assemblage. The Pool 20 ceramic assemblage is composed of 68% jars, 20% bowls, 8% dishes, and 4% plates (Figure 32).

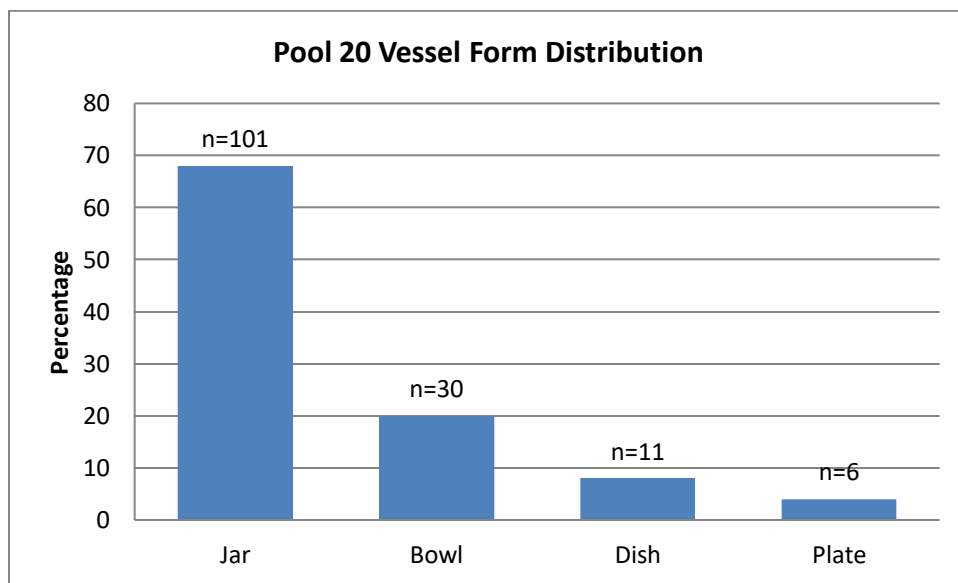


Figure 32. Pool 20 vessel form distribution

Of the 203 rim and neck sherds recovered from Pool 20 M208, 148 could be measured for orifice diameter. Jars had an average rim diameter of 24 cm, dishes 27 cm, bowls 34 cm, and plates 50 cm (Figure 33). The average orifice diameters for jars are somewhat larger than that of the Pool 1 assemblages, while dishes are somewhat smaller. Although neck sherds were recovered, the sherds were too small and poorly preserved to be measured.

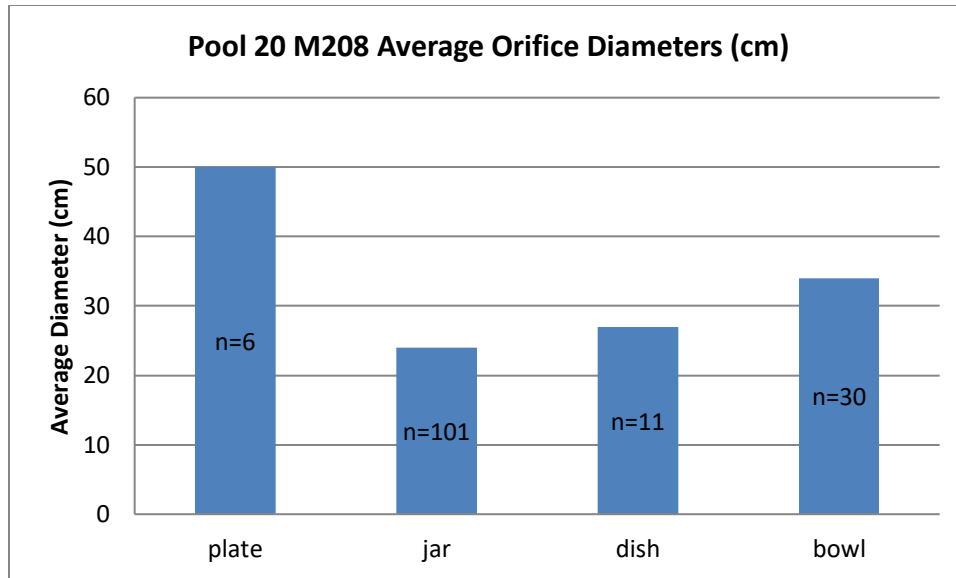


Figure 33. Pool 20 M208 Average Orifice Diameters (n=148)

*68 necks were also recovered, but were too fragmentary to be measured

The poor preservation of the Pool 20 M208 sherds made them more difficult to classify by type-variety than the Pool 1 ceramics. Many of the diagnostics that were recovered could not be typed due to poor preservation. A total of 35 diagnostics were typed, and eleven ceramic types identified (Figure 34). While jars are the most common vessel form at Pools 1 and 20, red-slipped types dominate the Pool 20 assemblage. Of the 35 vessels that were typed, nine were Sibun Red Neck jars (25%), seven were Runaway Creek Red-lipped jars (20%), seven were Vaca Falls Red bowls (20%), and five were Cayo Unslipped jars (14.29%). A single vessel each of Chunhuitz Orange, Daylight Orange, Indian Creek, Minanha Red, Mount Maloney Black, Palmar Orange, and Saxche Orange were recovered.

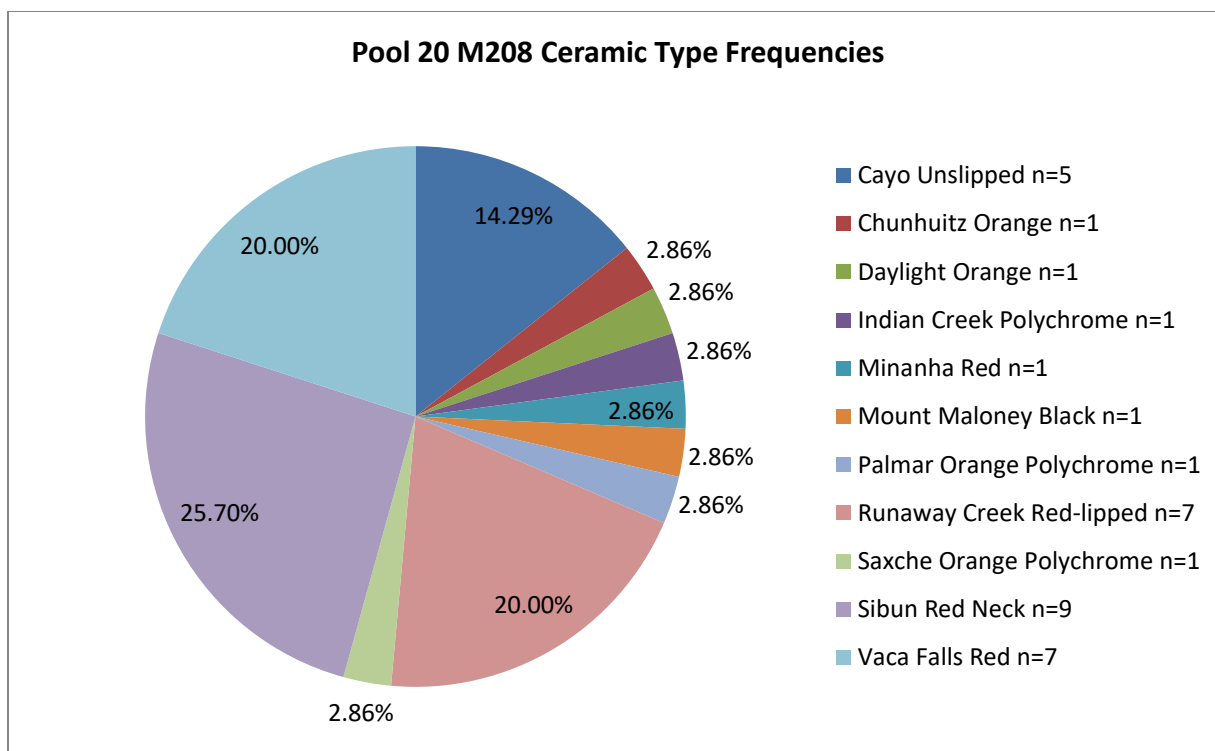


Figure 34. Pool 20 M208 ceramic type frequencies. Note the prevalence of red-slipped types.

A single Early Classic dedicatory cache was found in the M208 Str. 1 trench that was similar in many ways to the Pool 1 Str. 1 Dos Arroyos plate cache. The Hermitage group basal flange dish is likely a Minanha Red (Eleanor Harrison-Buck, personal communication, 2014) (Figure 35). Unlike the Str. 1 cache, the rim was found on the surface rather than in construction fill. How did an Early Classic vessel come to be on the surface of a Late Classic II/Terminal Classic structure? This vessel was likely an earlier dedicatory cache that was re-accessed and incorporated into a Terminal Classic structure. There is evidence of ceremonial reopening and re-use of Early Classic caches at both Pool 1 and Pool 20, which speaks to the significance of the settlement as these pools.



Figure 35. Minanha dish rim from Str. 1 trench topsoil

Discussion

A comparative analysis of several characteristics of the Saturday Creek and Cara Blanca ceramic assemblages reveals important similarities and differences between the sites in vessel form frequencies, ceramic type frequencies, average orifice diameters, and the apparent function (cooking versus serving) of the vessels. Together, these traits have important implications for understanding the Terminal Classic in central Belize as well as understanding the role that the sacred pools of Cara Blanca may have played in long-distance interaction and, potentially, pilgrimage. Saturday Creek is approximately 17 km southeast of the Cara Blanca pools, and travel between the two sites would have been relatively easy. In spite of their close proximity, the ceramic assemblages of Saturday Creek and the Cara Blanca pools are quite distinct and appear to have little in common. Cara Blanca has a distinctly non-residential ceramic assemblage, especially at Pool 1 where the excavated buildings seem to have been used for strictly ritual practices. The sites differ in ceramic vessel forms frequencies (Figure 36), ceramic type frequencies, and even in the average rim diameters of each vessel type.

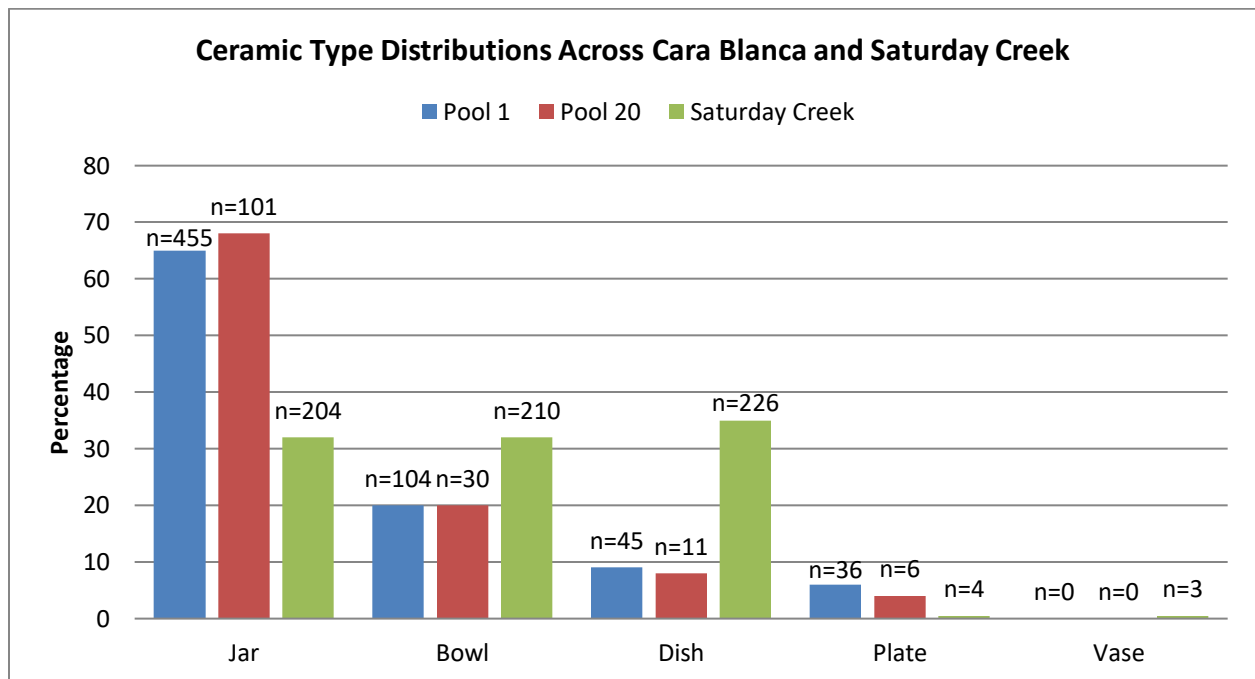


Figure 36. Ceramic vessel form distributions at Cara Blanca Pool 1, Pool 20, and Saturday Creek.

While the ceramic assemblages of Cara Blanca Pools 1 and 20 have quite similar vessel form frequencies, with jars dominating the assemblage followed by bowls and other serving vessels, the Saturday Creek ceramic type frequencies follow a different pattern. Saturday Creek has a nearly equal distribution of dishes, bowls, and jars, with very few plates and vases. This distribution is more in keeping with typical Late Classic domestic ceramic patterns (Lucero 2001:15), while Cara Blanca has far more jars than is expected for domestic contexts.

The average orifice diameters of the Saturday Creek and Cara Blanca vessels also suggests important distinctions between the sites. Saturday Creek jars range from 10-48 cm, dishes from 16-58 cm, bowls from 10-48 cm, plates from 24-44 cm, and vases from 12-19 cm.

Cara Blanca jars have a range of 10-45 cm, dishes of 25-50 cm, bowls of 10-50 cm, and plates from 29-55 cm. No vases were recovered from Cara Blanca. Table 3 provides a full comparison of the two assemblages.

Table 3. Statistical Comparison of Orifice Diameters (cm)

Vessel Form	Saturday Creek		Cara Blanca Pools 1 and 20	
	Range	Average	Range	Average
Jar	10-48 (n=204)	24.1	8-55 (n=402)	20.7
Dish	16-58 (n=226)	28.9	15-55 (n=49)	34.6
Bowl	10-48 (n=210)	26.1	10-60 (n=83)	32.3
Plate	24-44 (n=4)	33.5	29-55 (n=30)	38.9
Vase	12-19 (n=3)	16.3	n/a	n/a

*Neck diameters are not presented in this table because the Saturday Creek data does not include neck orifice diameters.

Although the orifice diameter ranges for each vessel type are remarkably similar, there are notable differences in the average orifice diameters. The Cara Blanca jars have smaller orifice diameters than Saturday Creek jars, but the dishes, bowls, and plates have orifice diameters that are up to 6 cm larger. Both Saturday Creek and Cara Blanca have large-bodied, wide-orifice jars. LeCount (1996:245) defines wide orifice jars as those that have an average rim diameter of 23 cm. Narrow orifice jars and vases are often used to pour and serve liquids, while somewhat wider orifice jars are used to store liquids and the widest orifice jars are used to store solid goods such as grain. In Late Classic Maya contexts, vases and narrow-orifice jars are associated with elite consumption of such prized food stuffs as chocolate (LeCount 1996:275). The Cara Blanca jars, on the other hand, seem to be best suited to storing liquid, and may have been used to hold water from the pools.

Although the Cara Blanca jars are relatively wide, most fall below the 23 cm threshold but above the 10 cm orifice that LeCount (1996:245) uses to define narrow-orifice jars. Cara Blanca jars, bowls, and plates have a wider range of orifice sizes than Saturday Creek vessels, but Saturday Creek bowls have a narrower orifice diameter range. This suggests greater standardization of Saturday Creek bowls compared to those found at Cara Blanca Pools 1 and 20, and may hint to the diverse pottery producing communities and traditions that I believe came together at the pools.

The lack of vases at Cara Blanca is an important temporal characteristic of the ceramic assemblage. Vases are typically considered to be elite vessels used for the consumption of precious liquids like cacao. These forms are relatively rare even in elite Late Classic II contexts, and disappear entirely in Terminal Classic Xunantunich (LeCount 1996:275). The absence of vases at Cara Blanca suggests that these sites were not elite-focused ritual centers, and more importantly, supports the conclusion that settlement at the Cara Blanca pools reached its peak of importance during the Terminal Classic.

Ceramic Types

The distribution of ceramic types at Saturday Creek, Cara Blanca Pool 1, and Cara Blanca Pool 20 shows that the Maya who lived or engaged with each site had distinct preferences for particular types (see Figures 9, 26, and 29). The ceramics of Pools 1 and 20 show a marked pattern in which a single ceramic type dominates the assemblage, while Saturday Creek ceramics

are more diverse and are not dominated by a single type. Saturday Creek has a total of 30 ceramic types, while the Cara Blanca pools combined have only 22 identified ceramic types, included two Early Classic types found only in cache deposits. Moreover, the Saturday Creek assemblage includes far fewer of the long-distance imports that I discuss below, suggesting that the ceramic assemblages reflect different social and political ties.

Slip Color Comparison

The predominant slip type is different at each of the three sites (Figure 37). This analysis of slip type distribution only considers the slip color of vessels that were identified according to type-variety. The Pool 1 assemblage is primarily unslipped, and the few slipped vessels are almost exclusively red. At Str. 1, 80.38% of the vessels are unslipped, 15.04% red slipped, 0.77% black slipped, and 3.45% are polychrome. The Str. 3 assemblage is 70% unslipped vessels, 26.67% red slipped, 2.22% orange slipped, and 1.11% black slipped. The plaza test pit has 78.57% unslipped vessels and 21.43% red slipped vessels. All of the Str. 4 vessels that could be typed were red slipped. At Pool 20, where Sibun Red Neck jars are the most common type, red-slipped vessels account for 65% of the total assemblage. Of the remaining vessels, 14.29% are unslipped, 2.86% black slipped, 5.72% orange slipped, and 8.58% are polychrome.

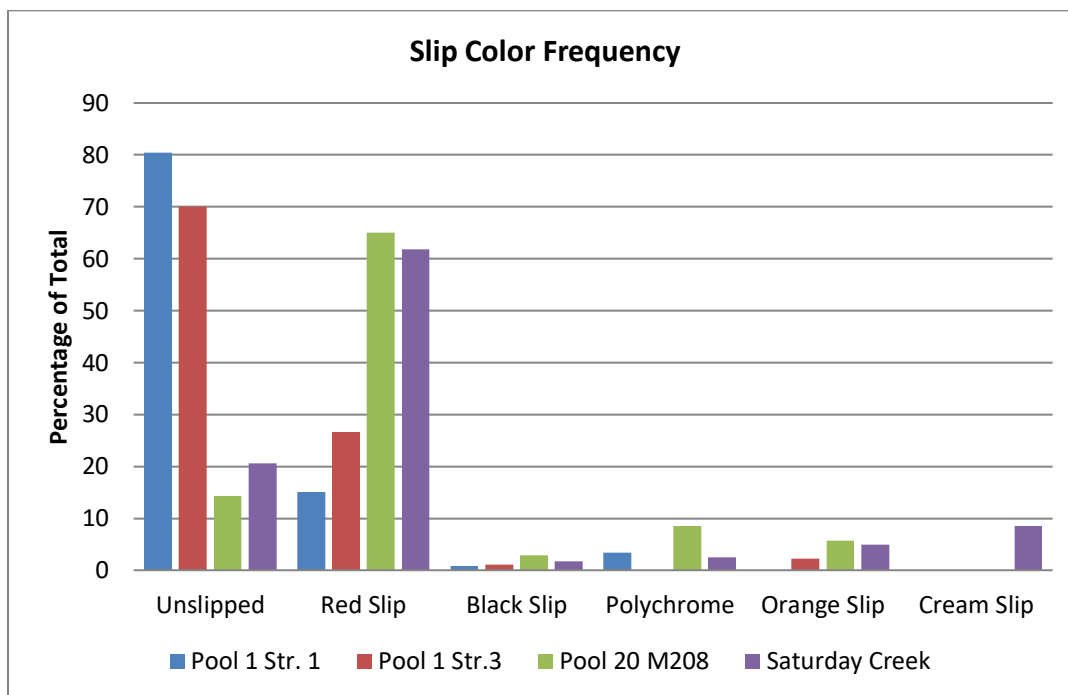


Figure 37. Slip color frequencies at Cara Blanca Pool 1 Strs. 1 and 3, Pool 20 M208, and Saturday Creek. Note the predominance of unslipped types at Pool 1 and red slip at Pool 20 and Saturday Creek.

Saturday Creek ceramic types are more diverse than the Cara Blanca assemblages. Saturday Creek also has cream slipped vessels, which are not found at either of the Cara Blanca pools. Late Classic II/Terminal Classic Saturday Creek has 61.8% red slipped vessels, 20.61% unslipped vessels, 1.69% black slipped vessels, 4.94% orange slipped vessels, 2.47% polychrome vessels, and 8.49% cream slipped vessels.

The Pool 1 ceramic assemblage is predominantly unslipped, while Pool 20 and Saturday Creek both have a majority of red slipped vessels. In spite of this difference, unslipped vessels are common at all sites. Orange slipped vessels are rare at all three sites, but are nearly absent at Pool 1, where they are only found in the Str. 3 sherd blanket. Cream slipped vessels are exclusively found at Saturday Creek, where Yaha Creek Cream is one of the most common ceramic types. Black slipped wares are rare across all three sites. The relative absence of black slipped wares is unexpected in the Terminal Classic in the southern lowlands. LeCount (1996:156) found that black slipped wares such as Mount Mahoney Black, Achote Black, and Meditation Black were common in the Late Classic II/Terminal Classic assemblage of Xunantunich. The Maya inhabitants of Saturday Creek and Cara Blanca preferred red slipped vessels and appear to have continued using and producing types more commonly associated with the Late Classic along with ceramic types that are considered to be markers of the Terminal Classic, such as Sibun Red Neck and square or bevel-lipped Cayo Unslipped jars.

Polychrome vessels are much more common at Cara Blanca than at Saturday Creek. The prevalence of polychromes may suggest a difference in status between the inhabitants of Saturday Creek and the ritual participants at Cara Blanca. Conversely, this difference could be attributed to the lack of cooking vessels found at Cara Blanca, as polychrome vessels are not used to cook food. This difference likely has many origins, including the diverse roles the sites have as primarily residential or ritual places, the connectivity of the site to long-distance exchange networks, and the special value that ritual objects hold compared to household objects. The vessels used at Cara Blanca's sacred pools may have been selected for their value, while the vessels used in daily life were more utilitarian wares that could be locally made and more easily replaced than polychromes brought from distant communities.

Vessel Function Comparison

Another difference between settlement at the Cara Blanca pools and Saturday Creek is the prevalence of vessels used for storage versus food preparation. In their original analysis of the Saturday Creek ceramics, Conlon and Ehret (2001 data) classified vessels according to their function as cooking or storage vessels. They identified 440 vessels used for storage, and 204 vessels used for cooking. Conlon and Ehret do not identify vessels used for serving, although as they classify all of the polychrome vessels as storage, I assume that they considered serving and storage to be the same function.

In the analysis of the Cara Blanca assemblages, I did not identify any vessels that were clearly used solely for cooking food. In fact, the bulk of the Cara Blanca assemblage is jars that would have made excellent storage vessels. LeCount (1996:244) notes that "hard, well-fired, polished vessels retain water and are good for serving, but they perform poorly as cooking pots." The ash tempered Cayo Unslipped and Sibun Red Neck jars of Cara Blanca would not have been ideal for cooking. Instead, these jars may have been used to store sacred water taken from the nearby *cenote*. While food preparation must have occurred near the water temple (Str. 1) and nearby platform (Str. 3), the Pool 1 assemblage does not include any vessels with charring or visible residues indicative of food preparation. Likewise, the ceramic assemblage from Pool 20 M208 did not include any clearly identifiable cooking vessels. Instead, the assemblages are dominated by large storage jars and wide-orifice serving bowls, plates, and dishes that would have been suitable for large gatherings of people. Distinguishing between cooking and serving vessels is further complicated by the heavily burned vessels we found at Strs. 1, 3, and M208. This burning was caused by a fire deliberately set by the ancient Maya when they terminated

these ritual structures and likely masks any evidence that vessels would have had of exposure to cooking fires.

(Re)Defining the Terminal Classic

The Terminal Classic is a brief period of great social change, yet material traces of the Terminal Classic are ephemeral. LeCount (1996:164) describes Terminal Classic ceramics as a “dramatic shift” from Late Classic types; however, after analyzing the Terminal Classic ceramic assemblages of Saturday Creek and Cara Blanca, this seems to be the case for urban, elite centers rather than smaller hinterland communities. LeCount found that calcite temper is used almost to the exclusion of ash temper in the Terminal Classic, while Cayo Unslipped and Mount Maloney group ceramics account for 70% of Xunantunich’s Terminal Classic ceramic assemblage. She identifies Belize Red and Chunhuitz Orange as minor Terminal Classic types, while Vaca Falls and Garbutt group vessels are rare (LeCount 1996:164-165). A handful of ceramic traits are typically used to identify the Terminal Classic; however, there is overlap between Late Classic II and Terminal Classic ceramic types. In the Belize Valley, one of the most distinctive Terminal Classic markers is a pie crust lip treatment on Cayo Unslipped jars (LeCount 1996:243), as well as flaring, squared and beveled lip treatments (Eleanor Harrison-Buck, personal communication, 2013; Heather McKillop, personal communication, 2014).

At Cara Blanca, Terminal Classic and transitional Cayo Unslipped lip treatments are found alongside the rounded lip treatments that are considered to be more typical of the Late Classic (Figure 38). There is also evidence for merging ceramic traditions in the handful of Cayo Unslipped jar rims that mix the traits of Terminal Classic Cayo Unslipped and Tu-tu Camp Striated, such as a darker paste and light striation.



Figure 38. Cayo Unslipped jar rims. Top left and bottom: Cayo Unslipped jars with a mixture of Late and Terminal Classic rim treatments found in the same context. Top right: Cayo Unslipped jar with blended traits.

Black slipped vessels from the Mount Maloney group are completely absent at Cara Blanca, while Mount Maloney and Meditation Black are exceedingly rare at Saturday Creek. Red slipped types considered relatively scarce, particularly Belize Red and Vaca Falls Red, continue into the Terminal Classic at Cara Blanca and are present at Saturday Creek. Finally, ash temper remains common at Cara Blanca Pool 1, where even the most utilitarian, unslipped types include volcanic ash temper.

Additionally, the Terminal Classic sees an influx of non-local types from Northern Belize and the Sibun Valley into central Belize. Many of these types were placed in the Late Classic or Postclassic by Gifford et al. (1976), but Harrison-Buck (2007) revises Gifford's chronology to place types such as Mountain Pine Red and Daylight Orange group in Terminal Classic contexts. Moreover, the presence of Terminal and Late Classic lip treatments in a single context further challenges archaeologists to revise our understanding of the Terminal Classic and suggests that although archaeologists may define Terminal Classic ceramic assemblages based on elite centers, hinterland communities had a different experience and different material expressions of the Terminal Classic.

Non-Local Ceramic Types: Re-framing Terminal Classic Regional Interactions

Several types distinguish Terminal Classic Cara Blanca from contemporary sites in the upper Belize Valley. Sibun Red Neck jars, which, along with Cayo Unslipped are the most common ceramic types found in the Sibun Valley during the Terminal Classic, are a Terminal Classic marker (Harrison-Buck 2007:255). Jars with red slipped necks are common at Terminal Classic San Jose (Thompson 1939:138-139), but are rare in the upper Belize Valley. At Barton Ramie, where red slipped jars are quite rare, the lack of red slipped jars led Gifford to misidentify Sibun Red Neck as Vaca Falls Red (Harrison-Buck 2007:257). The evidence from Cara Blanca and the Sibun Valley suggests that outside of the Belize Valley, Terminal Classic communities are participating in ceramic traditions that are quite different from those of the upper Belize Valley.

A number of non-local ceramic types recovered at Cara Blanca suggest that people came to the pools as travelers, possibly pilgrims, from Northern Belize, the Yucatan Peninsula, and Guatemala. Although archeologists typically assume that the objects and goods that circulated in long-distance trade networks were exotic, easily portable items such as cacao, feathers, obsidian or salt, large and seemingly unwieldy objects were also transported across great distances (Rathje 1971). Neff (2003) found that San Juan Plumbate vessels produced on the northern Pacific coast of Guatemala were traded across much of Early Postclassic Mesoamerica. Likewise, some of the non-local ceramic types recovered at Cara Blanca take the form of very large, heavy vessels. Canoe travel along oceanic and riverine routes was key to ancient Maya trade networks, and the transition to the Postclassic saw a rise in ocean ports (McKillop 2005a:48). During the rainy season, many more possible inland trade routes open up as the seasonal wetlands flood (Harrison-Buck 2014:250). Thus in spite of the massive size of non-local ceramics like the jaguar vessel, long-distance transportation of such items would have been quite accomplishable through canoe travel.

Two types that distinguish between the upper Belize Valley and hinterland sites that have a more northern influence are Achote Black and Palmar Orange Polychrome. Both types are trade wares. During the Late Classic II they come from the Petén while in the Terminal Classic, these vessels are produced in northern Belize (Harrison-Buck 2007:297). One Achote Black tecomate was found in 2013 at Cara Blanca Pool 1 Str. 1, and is characteristic of Late Classic II ceramic traditions. This small, thin-walled vessel connects Cara Blanca to the Petén district of Guatemala (Harrison 2014). The Achote Black bowl found at Saturday Creek, however, is part of the Terminal Classic tradition coming out of northern Belize. The Cara Blanca tecomate is typical of the mixed Late Classic II and Terminal Classic assemblage that brings together different ceramic traditions in new ways at the sacred pools, while the Saturday Creek bowl reflects the new ties that central Belizean Maya communities were creating with far-flung places.

The polychrome types also indicate a northern influence at Cara Blanca, and possibly Saturday Creek. The Palmar Orange Polychrome bowls found at Saturday Creek and Cara Blanca may be reflections of these new northern ties. During the Late Classic, Palmar Orange Polychrome vessels are brought through trade networks from the Petén, while a separate tradition arises in Northern Belize during the Terminal Classic (Aimers 2002:323; Gifford 1976:192-193; Mock 2005a; Mock 2005b). The slightly streaky slip of the Cara Blanca Palmar Orange Polychrome bowls places them in the new, northern ceramic tradition and indicates that the most significant ties Cara Blanca had beyond central Belize were to this northern tradition.

The Fat Polychrome jaguar vessel found at Pool 1 Str. 1 has a decorative style more typical of the Yucatan (Ellie Harrison-Buck, personal communication, 2013) (see Figure 22) and the Indian Creek Polychrome found at Pool 20 M208 Str. 1 was most likely produced in Northern Belize. Fat Polychrome basal break bowls similar in form and size to the jaguar vessel are found in Northern Belize (Mock 1994:273-274). Harrison-Buck (2007:244) writes that Fat Polychrome indicates the “strong Yucatec influence...that was introduced to sites in Belize in the Terminal Classic.” A second similar polychrome type, Indian Creek Polychrome, was defined by Harrison-Buck (2007) for the Terminal Classic Sibun Valley and appears at Pool 20 M208. Indian Creek Polychrome is typically found in Northern Belize, and reflects the northern influence on central Belizean Terminal Classic sites (Harrison-Buck 2007:415). In the Sibun Valley, Indian Creek vessels take the form of bowls and platters, and are highly standardized with an average orifice diameter of 25-27 cm (Harrison-Buck 2007:345). The Pool 20 Indian Creek vessel, with its 25 cm rim diameter, fits the standard production size but is a jar rather than a bowl. This reflects the innovation and merging of ceramic types and forms that is seen throughout Cara Blanca’s ceramic assemblage.

Not only is Cara Blanca a distinct entity within the region, we find great variation within the ceramic assemblage here. Even the common forms, most notably our Cayo Unslipped water jars, show a great degree of variation. While Gifford notes that Cayo Unslipped are made with different lip treatments (Gifford et al. 1976:278-279), at Cara Blanca there is a mix of squared, beveled, rounded, and pointed lips within the same contexts. The paste of the Cayo Unslipped jars is also non-standard, as the jars are predominantly tan or buff. Tu-tu Camp Striated jars also differ from the typical darker pastes, as most of the Tu-tu Camp Striated recovered from Cara Blanca have a buff or tan paste. I suggest that what is happening at Cara Blanca is a merging of different styles, as demonstrated by the mixed trait jar found at Str. 3 (see Figure 37). I think that Cara Blanca has the marks of different communities, each with their own pottery producing traditions and stylistic preferences, coming together at the sacred pools. The variation in the ceramics is the product of diverse communities bringing together different local materials, or

pieces of places, to create a material record that reflects the diversity of the people who came to Cara Blanca.

Concluding Remarks

In this paper, I have presented an analysis of the ceramics from two Maya sites in central Belize in order to understand the relationship between people and the sacred pools of Cara Blanca through the diverse materials that were used in ritual practices at the pools. I found that Cara Blanca stands apart from other sites in central Belize, particularly the Belize Valley region represented by Saturday Creek and Barton Ramie. While the minor centers of the Belize Valley are socially, politically, and economically connected to larger sites in the upper Belize Valley and the Petén, Cara Blanca seems to have stronger ties to new social networks and ceramic traditions that were emerging in northern Belize and the Yucatan. This analysis broadens our understanding of the southern lowland ceramic traditions that were created and/or sustained during the Terminal Classic, and reveals the ways in which social transformation unfolded in the hinterland of central Belize. Additionally, this paper explores the central role of landscapes and materials as physical bodies that provoke, facilitate, and reify the ongoing negotiations of social transformation.

The Terminal Classic ceramic assemblage of Cara Blanca is the result of a unique conjunction of time, space, and people in central Belize. Not only are the pools special for the sacred natural features, but for the people who engaged with the site as well as the materials they created are part of a special convergence of sacred space, people, and other-than-humans. While the ceramic assemblage of Cara Blanca has certain traits that are distinctive of Terminal Classic central Belize ceramics, it is also unique in its inclusion of exotic polychromes, exclusion of black-slipped wares, and the prevalence of ash-tempered water storage jars. Cara Blanca Pool 1 Str. 1 appears to have been built in the Late Classic II/Terminal Classic, but includes earlier materials that tie the water temple to ancestral histories. Pool 20 M208 also weaves these ancestral references into its Terminal Classic life history.

Cara Blanca's ceramic assemblage builds our understanding of Late Classic II and Terminal Classic ceramics by challenging the assumptions we often make about the material markers of these difficult to distinguish periods of ancient Maya history and by presenting a particular conjunction of people and things in a sacred place unique in the local environment. The combination of ceramic types from throughout the Maya lowlands and diverse rim treatments on more locally common types such as Cayo Unslipped suggests that pilgrimage to the sacred pools may be a driving factor in the ceramic assemblage. While other contemporary central Belizean sites such as Xunantunich have ceramic assemblages dominated by black slipped wares, we see the preference for red slip, non-local polychromes, and great diversity in rim treatments. Although we are uncertain as to where the ceramics were produced, I suggest that people from different communities and even different regions contributed to the material record of Cara Blanca. Given the sacred and unique qualities of the pools, these people likely came as pilgrims to engage in water ritual at a time of climatic instability.

During the Terminal Classic, the social networks and political affiliations of the Late Classic unraveled and the minor centers and hinterland communities of the southern lowlands aligned in new ways. This unraveling is seen at Cara Blanca. Settlement at the pools is not closely tied to Belize Valley communities. Cara Blanca appears to have been partaking in the new social networks woven between the northern and southern lowlands, while Saturday Creek

may have remained enmeshed in the older, western-focused tradition that linked the Belize Valley and Petén. While members of the community of Saturday Creek may have journeyed to Cara Blanca, they do not appear to have had strong material ties to the sacred pools. Rather, it seems that the new, Terminal Classic ceramic traditions prevailed in shaping Cara Blanca materially, if not socially. The Cara Blanca ceramic assemblage suggests that far-flung communities from the Yucatan, northern Belize, and the Sibun Valley may have had a stronger attachment to the pools than closer communities from the nearby Belize Valley.

This paper contributes to research on social change, landscapes, and materiality in several ways. By approaching the ramifications of sociopolitical failure and environmental instability from the perspective of ritual, this analysis emphasizes non-violent responses to social and ecological challenges, and focuses on common people living in the hinterland rather than urban elites. This analysis adds to our understanding of sacred landscapes by presenting a natural shrine that drew pilgrims from throughout the lowlands. The Cara Blanca pools remind us of the need to look beyond mountains and consider the role of remote places in the sacred landscape of ancient Mesoamerica. Finally, this study contributes to research on materiality by demonstrating the critical role of ceramics in ritual practices that bring people and places together in new ways. The Maya would have been aware of the different ceramic traditions that converged at Cara Blanca. These ceramics were integral to the creation of new social fields, facilitating and physically manifesting the emerging social, political, and economic system.

Future directions for research include excavation and analysis of ceramics from a broader range of sites. Further research is needed to identify the role of local communities, such as the nearby site of Yalbac, in building and using Cara Blanca and to further assess the possibility that travelers from the north brought exotic polychromes to the pools as offerings. Residue analysis and petrographic and chemical studies of the composition of local and non-local ceramics, as well as identification of clay sources and production areas, will further build our understanding of who the pilgrims were who came together at the sacred pools of Cara Blanca.

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Appendix: Ceramic Type Tables

Table 1 Terminal Classic Ceramic Types Recovered from Saturday Creek.

Achote Black	Garbutt Creek Red	Roaring Creek Red
Alexanders Unslipped	Humes Bank	Rubber Camp Brown
Belize Red	Kaway Impressed	Silver Creek Impressed
Benque Viejo Polychrome	Meditation Black	Tinanha Red
Cayo Unslipped	Mount Maloney Black	Tu-tu Camp Striated
Chunhuitz Orange	Mountain Pine Red	Vaca Falls Red
Cubeta Incised	Paballon Molded Carved	Xunantunich Black-on-Orange
Daylight Orange: Darknight	Palizada Black-on-Orange	Yaha Creek Cream
Daylight Orange: Daylight	Palmar Orange Polychrome	Yalbac Smudged Brown
Dolphin Head Red	Platon Punctated	Yuhactal Black-on-Red

Table 2 Percentages of Lesser Types Recovered at Saturday Creek

Achote Black	0.2% (n=1)
Alexanders Unslipped	1.5% (n=10)
Benque Viejo Polychrome	0.5% (n=3)
Chunhuitz Orange	1.1% (n=7)
Cubeta Incised	0.3% (n=2)
Daylight Orange: Darknight	0.5% (n=3)
Daylight Orange: Daylight	0.9% (n=6)
Garbutt Creek Red	5.9% (n=38)
Humes Bank	1.2% (n=8)
Kaway Impressed	0.8% (n=5)
Meditation Black	1.4% (n=9)
Mount Maloney Black	0.2% (n=1)
Paballon Molded-Carved	0.2% (n=1)
Palizada Black-on-Orange	0.6% (n=4)
Palmar Orange Polychrome	0.9% (n=6)
Platon Punctated	0.6% (n=4)
Rubber Camp Brown	0.6% (n=4)
Silver Creek Impressed	1.2% (n=8)
Tinanha Red	0.5% (n=3)
Tu-tu Camp Striated	1.9% (n=12)
Xunantunich Black-on-Orange	0.6% (n=4)
Yalbac Smudged Brown	3.6% (n=23)
Yuhactal Black-on-Red	0.8% (n=5)

Table 3 Str. 1 Ceramic Type Frequencies (n=260)

Type	Count	Percentage
Achote Black	2	0.77
Alexanders Unslipped	4	1.54
Belize Red	17	6.54
Cayo Unslipped	196	75.38
Dolphin Head Red	4	1.54
Dos Arroyos Polychrome	1	0.38
Dos Hermanos	1	0.38
Fat Polychrome	1	0.38
Humes Bank	1	0.00
Palmar Orange Polychrome	7	2.69
Roaring Creek Red	1	0.38
Sibun Red Neck	13	5.00
Tu-tu Camp Striated	8	3.08
Vaca Falls Red	4	1.54

Table 4 Str. 3 Ceramic Type Frequencies (n=90)

Type	Count	Percentage
Achote Black	1	1.11
Belize Red	1	1.11
Cayo Unslipped	61	67.78
Chunhuitz Orange	1	1.11
Daylight Orange: Darknight	1	1.11
Mountain Pine Red	23	25.56
Tu-tu Camp Striated	2	2.22

Table 5 Pool 20 M208 Ceramic Type Frequencies (n=35)

Ceramic Type	Count	Percentage
Cayo Unslipped	5	14.29
Chunhuitz Orange	1	2.86
Daylight Orange	1	2.86
Indian Creek Polychrome	1	2.86
Minanha Red	1	2.86
Mount Maloney Black	1	2.86
Palmar Orange Polychrome	1	2.86
Runaway Creek Red-lipped	7	20.00
Saxche Orange Polychrome	1	2.86
Sibun Red Neck	9	25.71
Vaca Falls Red	7	20.00