

## Recent Research at San Isidro, El Salvador, in the Context of Southeastern Mesoamerican Archaeology

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### *Abstract*

Despite receiving a fair amount of scholarly attention the archaeology of the extreme southeast of Mesoamerica still remains a relatively poorly developed focus of study (Love and Kaplan 2011). In this article I identify some important factors that hamper our understanding of the ancient past of this region, including, but not limited to, the lack of data about the effects of population density and of volcanism, and exceptionally uneven distribution of data from different periods. The second half of the Preclassic period (ca. 1000 BC - AD 250) seems to be the most neglected by researchers, even as it is likely the most crucial time for the southeastern boundary of Mesoamerica from the perspective of reconstructing processes of cultural dynamics and emergence of identities. I offer what I believe is a reasonable albeit partial solution to the problem by presenting recent research results, as well as outlining the future directions of my ongoing investigations at the large Preclassic site of San Isidro, located in the Sonsonate department of El Salvador. I argue that even at the early stages of these investigation, San Isidro shows great potential for providing data to better understand El Salvador's ancient past as an important player in the Mesoamerican past.

**Keywords:** Southeast Mesoamerica; El Salvador; Volcanism; Drone Survey

### *Resumen*

**Investigaciones recientes en San Isidro, El Salvador, en el contexto de la arqueología del sureste mesoamericano**

*La arqueología del extremo sureste de Mesoamérica, a pesar de recibir una buena cantidad de atención académica, sigue siendo un campo relativamente poco desarrollado. En este artículo identifico los principales factores que dificultan nuestra comprensión del pasado antiguo de esta región, incluida, entre otros, la densidad de población, el volcanismo, y una distribución excepcionalmente desigual de datos de diferentes períodos. La segunda mitad del período Preclásico (ca. 1000 a. C. - 250 d. C.) parece ser el período menos estudiado y probablemente el más clave para la frontera sureste de Mesoamérica desde la perspectiva de la reconstrucción de procesos de dinámicas culturales y el surgimiento de identidades. Ofrezco una solución probable, aunque sólo parcial, al problema al presentar avances recientes y direcciones futuras de mi investigación en curso en un gran sitio del Preclásico de San Isidro en el departamento de Sonsonate en El Salvador. Sostengo que incluso en la etapa inicial de la investigación, San Isidro muestra un gran potencial para proporcionar los datos faltantes sobre el pasado de el Salvador y el rol que jugaba en el pasado mesoamericano.*

## Introduction

Since its appearance in the first half of the twentieth century, the idea of Mesoamerica as a relatively coherent cultural area (Kirchhoff 1943) where particular cultures shared multiple common traits (such as vigesimal numerical systems, permutations of two independent calendars, ritualized ball game, or agriculture based on maize, squash, and beans, among others), has become universally accepted in the scholarly community (see Coe and Houston, 2015: 14-16; Sharer and Traxler 2006: 28-29). Over time it underwent several revisions and adaptations to fit the ever-growing corpus of available data (see Feinman 2019). The spatial extent of Mesoamerica, however, remains problematic, particularly with regard to its southeastern extremity (e.g., Creamer 1987; Hoopes and Fonseca 2003).

While the concept of a clear-cut cultural boundary no longer seems to be considered to be a reflection of ancient reality, no consensus has been achieved about how to model, describe, and understand the transition zone between Mesoamerica and Lower Central America. This lack of clarity is caused, at least in part, by spotty availability of archaeological data. The Honduran part of the Mesoamerican southeast has been relatively well known thanks to extensive, multi-annual survey and archaeological projects at or near Copan, Naco, Ulua, and in the Comayagua valleys, and recently in the Mosquitia region, as well (Fash 1983; Manahan and Canuto 2009; Schortman and Urban 2011, 2014; Schortman et al. 2001; Schortman and Urban 1995; Schortman et al. 1986; Dixon 1989; Dixon et al. 1994; Fisher et al. 2016). Those studies were largely built upon an array of earlier work, such as the pioneering research by Glass (1966).

Scholars' views are not unanimous on how far the southern portion of the Mesoamerican Southeast reached in different time periods. In El Salvador, which is the likeliest candidate for the transition / buffer zone for most of the ancient times, the current state of archaeological knowledge leaves much to be desired, which may be somewhat surprising given that after pioneering surveys by Longyear (1944; 1966) and Haberland (1960) which paralleled those conducted by Glass in Honduras, a number of site-oriented or regional studies have been carried out across the area (Fig. 1).

In the western portion of the country, investigations at El Carmen, Santa Leticia, Cara Sucia, and Chalchuapa stand out. Additionally, the Chalchuapa ceramic chronology became a point of reference for most of the later investigations in El Salvador (Demarest et al. 1989; Demarest 1986; Amaroli 1987a; Sharer 1978; Shibata et al. 2014; Sharer and Gifford 1970). Other ceramic studies in the western El Salvador include those by Beaudry (1983) and Sampeck (2007).

The central-western valley of Zapotitán was archaeologically surveyed and investigated by the Protoclassic Project led by Payson Sheets in the 1970s (Sheets 1975), and the two best-known sites within it, San Andrés and Joya de Cerén, have been

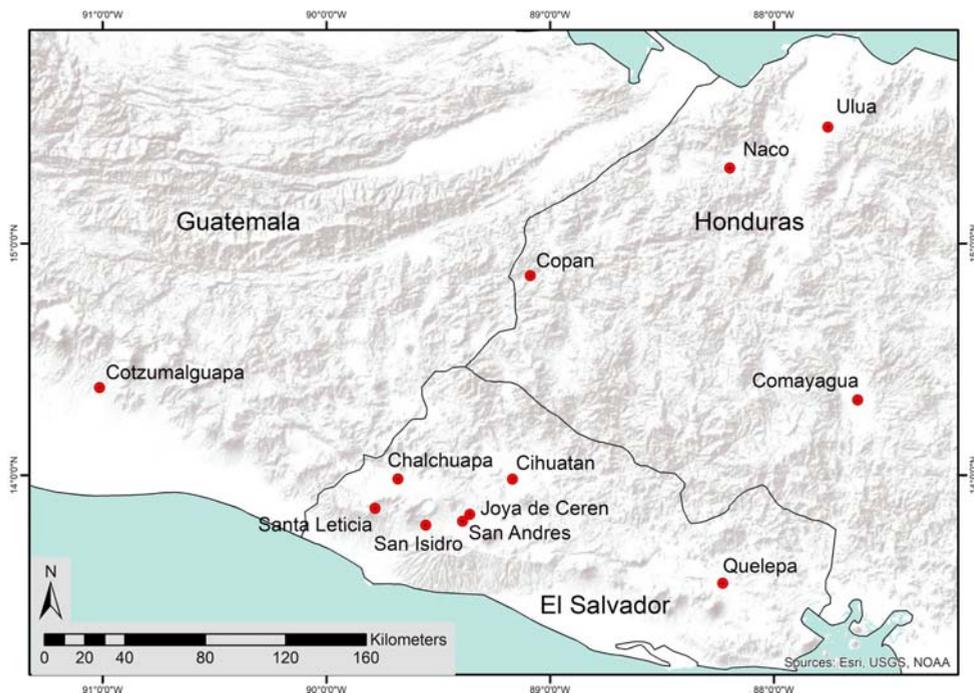


Fig. 1. Map of the southeastern edge of Mesoamerica showing location of some of the places mentioned in the text (Author).

continuously studied until today (Black 1983; Boggs 1943; Díaz et al. 2013; Ichikawa 2017; Sheets 2002; Sheets et al. 2015). In the Paraíso basin to the north, just before building a dam on the Lempa River that turned a densely occupied zone into the Cerón Grande reservoir, salvage survey was conducted by Fowler and Earnest (1985), and two of the primary sites that survived the flooding due to their elevated location, Cihuatán and Las Marías, have been on archaeologists' radar ever since (Bruhns 1980; Kelly 1988; Bruhns and Amaroli 2009; Amaroli 2012; Amaroli and Bruhns 2002). Recently, Fowler (2019) has presented an update on the Pipil migrations in the northwestern territories of the country. Additionally, western El Salvador has been often included in the so-called Southern Maya Region (SMR), which, somewhat contrary to its name, has been envisioned as an area of multiple ethnic and linguistic identities (see Love and Kaplan 2011; Kaplan and Paredes-Umaña 2018).

Territories east of the lower Lempa River lag behind. Only a handful of sites have been investigated. Two of them, namely Los Llanitos and Quelepa, were partially studied decades ago (Longyear 1944; Andrews 1976). Slightly more recent are excavations at Asanyamba and Loma China, although the latter has never been published in any accessible form (Beaudry 1982; Garnica and Ramírez Menjívar 2009: 8). The El Chiquirín site constitutes an accidental finding that was salvaged prior to its destruction (Escamilla and Shibata 2005). Recently that long-neglected

region finally became a focus of three investigations, each of different scope (Valdivieso 2006; Amador 2009; Gómez 2010).

A few long-term projects have either just begun, were of somewhat smaller scale, or await formal publication; these include Ataco, Tamanique, and San Isidro (Paredes-Umaña 2013; Miriam Méndez, personal communication, April 2019; Szymański *et al.* 2018). Apart from those methodical studies, a number of salvage, opportunistic, or informal investigations have been carried out at several sites across El Salvador, including, in the Güija Lake area, Tacuscalco, Tehuacán, El Tanque, Nueva Esperanza, and multiple locations within greater San Salvador. For an insightful, although not academically referenced review of those activities, and of Salvadoran archaeology in general, see a recent book by Paul Amaroli (2015).

### **Obstacles for Archaeology in El Salvador**

As already mentioned, at first glance there should be enough data available from a relatively small country (just over 20 000 km<sup>2</sup>) to understand and reconstruct its archaeological past. Why, then, is it still so poorly known? Why is it that such fundamental issues as the cultural affiliation of so many ancient Salvadoran sites continue to be hotly debated? The answer, I think, is threefold.

First of all, archaeologists interested in Salvadoran archaeology are at a disadvantage because they need to operate in the most densely populated country in Central America (for official 2016 census data processed by Index Mundi, see <https://www.indexmundi.com/facts/el-salvador/population-density>). Modern urban and rural development extends far and wide, rendering significant portions of land, likely containing buried cultural traits, inaccessible. Most undeveloped areas are under cultivation of staples and cash crops, or are pastures. Current owners of sugarcane or coffee plantations are reluctant to let archaeologists pass through and register the potential archaeological features, let alone excavate them, in fear of having their businesses disrupted. In effect, what often looks like a thorough investigation of an ancient site is in reality a limited excavation of only some of the most prominent structures in an area. That was precisely the case of Quelepa, and partially even Chalchuapa (Sharer 1978; Andrews 1976), and in recent times the site of Las Mariás (Amaroli 2000). This is not by any means a critique directed at the investigators, who had to maneuver between the needs of a project and the wishes of the hosts. On the contrary, this limitation makes all the more impressive the abilities of those scholars, who theorized and posited models of ancient societies that remain in use even today, despite having such incomplete sets of data. Extensive projects at large sites similar to those conducted in the Guatemalan or Mexican rainforest, or even in neighboring Honduras, seem impossible in most of the Salvadoran territories.

The second factor that hampers our understanding of the ancient history of El Salvador is volcanism. On the one hand, volcanic activity can help archae-

ologists determine stratigraphic chronologies. Such is the case of the famous TBJ (*tierra blanca joven*) stratum found in most archaeological sites and profile cuts in the western and northern portion of the country. Once it was securely tied to the mega-eruption of the Ilopango volcano sometime in the Classic Period (ca. AD 250-900), that distinctive, easily detectible white-yellowish layer of soft ash served to distinguish the “before” and “after” (Amaroli 2015: 148). At the times of the Chalchuapa and Quelepa projects the Ilopango eruption was generally thought to have happened ca. AD 260, thus coinciding well with the established dating of the Preclassic-Classic transition in the Maya area. The TBJ layer was used to distinguish the Preclassic societies of the Caynac (Chalchuapa) and Uapala (Quelepa) phases immediately below it, from the Classic Payu and Shila phases immediately above (Sharer 1978: 53-57, 107-111, 119; Andrews 1976: 179, 182-183). On the other hand, with the shifting dating of the Ilopango event from ca. AD 260 to ca. AD 429, to AD 536, and finally to AD 539/540, this tight fit between the natural catastrophe and the cultural crisis no longer seems plausible. The Preclassic/Classic transition models are calling for a deep revision (Dull et al. 2001; 2010; Amaroli 2015: 148-166; Ichikawa 2016, Dull *et. al.* 2019).

But volcanism, apart from being able to mislead chronologies, may also impact and skew archaeological surveys. Stanley Boggs first noted that massive ash falls can drastically alter the landscape. Judging from several-meter deep TBJ strata near the Ilopango Lake, and the estimation by Dull and his colleagues that the amount of tephra expelled at the time of the TBJ eruption exceeded 40 cubic kilometers, it is entirely possible that some deep valleys might have been completely or partially filled, some rivers dammed and redirected, and some smaller springs buried and blocked permanently (Amaroli 2015: 15; Dull et al. 2019). After some time, the more loose and soft pockets of ash would be washed away, eventually bringing landscapes back to their pre-eruption condition, but where the tephra became compacted and hard, changes would persist. In addition to these perturbing events, several other eruptions and lava flows have altered the landscape in significant ways, likely burying an unknown amount of archaeological remains below tons of ash or impenetrable layers of pumice and hard magmatic rocks. The best-known example of the former is the Loma Caldera eruption that buried the Joya de Cerén sometime in the first half of the seventh century AD (Sheets 2013: 29). Historical accounts describing the San Marcelino (AD 1722), El Playón (1658), and Boquerón (1917) eruptions, confirm the volcanic impact on the cultural landscapes (Carr and Pontiers 1981; Black 1983: 63, 72).

For all of these reasons any archaeological survey in El Salvador is handicapped both during the planning and executing phases. The planning usually requires selecting a territory that, by general knowledge and analogy, has potential to yield information about archaeological settlement patterns, based on interpolation of past conditions that may have been optimal for ancient inhabitants (water ac-

cessibility, resources, cultivable lands, defensive position or location at a juncture of trade routes, etc.). Such an interpolation in El Salvador seems to bear a higher-than-average risk of being inaccurate simply because the landscape alterations that ensued since then may have been so decisive. In other words, what archaeologists see today when looking around in El Salvador may be significantly different from what was seen by the prehispanic peoples living on those lands.

The execution phase of a survey, after discounting areas covered by modern urban and rural development, and those that cannot be accessed due to lack of permission, is thus often limited to either the steep, rocky volcanic slopes, or the pumice and basalt fields that leave no hope for finding any pottery or architectural remains.

The final problem that is an obstacle in understanding the ancient cultural dynamics of El Salvador, and in part resulting from the previous two, is the extremely unbalanced availability of data from different time periods. Naturally, one can argue that such is the nature of archaeology in general, and this problem is certainly not limited to El Salvador; however, southeastern Mesoamerica appears to be suffering from it more than other regions. It seems that our understanding of the Salvadoran past severely diminishes from the Postclassic (ca. AD 900 – 1520) backward.

Copious Early Colonial sources, as well linguistic data, help to fill in the cultural mosaic on the eve of the Conquest (Larde 1926; Miles 1957; Campbell 1997; 2016; Constenla Umaña 1991; Escalante 2000; Rogers 2016). A number of sites have yielded data from the Early Postclassic (ca. AD 900 – 1250), among them Cihuatán and Las Marías, El Cajete, Antiguo Cuscatlan, Loma China, and portions of the Izalcos region (Bruhns 1980; Amaroli 1983; Amaroli 1986; Amador 2009; Sampeck 2007).

The significant discontinuities observed for the Classic / Postclassic transition, which apparently happened sometime in the tenth century AD, constitute a major complication for archaeologists. We are not certain to what extent the arrival of the Pipil disrupted the Late Classic distribution of cultural identities in El Salvador. One can speculate that there was not much left to disrupt, and the newcomers merged and mixed while shaping the new reality after the Classic collapse. Short of that conclusion, the nature of the cross-cultural exchange during the Late Classic remains murky, at best. There is no unambiguous evidence that would place eastern El Salvador exclusively within either the Mesoamerican, or Isthmo-Colombian interaction spheres (Andrews 1976; Bruhns 1996; Ashmore 2014). The Tamasha-phase site of Cara Sucia is often interpreted as the easternmost outpost of the Cotzumalguapa cultural enclave, with Quelepa displaying some Southern-Guatemalan and / or Veracruzian traits as well (Amaroli 1987a; Moraga et al. 2010). However, one may ask, what is the nature of the Cotzumalguapan cultural entity, how might it relate to Classic Veracruz, and what implications may it bear for the southeast (Ashmore 2014; Chinchilla 2012; Daneels 2001)? Can it be interpreted as an evidence

of cultural intrusion from the Gulf Coast of Mexico, adding yet another element to the cultural mosaic of the region? How would that intrusion impact the modern perception of southeastern Mesoamerica as a peripheral area? Otherwise, Late Classic data have been recovered from primary contexts at numerous sites, such as Chalchuapa, Cara Sucia, San Andres, Quelepa, Santa Leticia, and others, offering at least some cultural framework to build upon in theorizing on cultural identities of ancient societies of El Salvador (Sharer 1978; Moraga et al. 2010; Ichikawa 2017; Andrews 1976; Demarest 1986).

The next great challenge is posed by the eruption of Ilopango around AD 540. Robert Dull and his colleagues (Dull *et al.* 2019) picture a natural catastrophe of apocalyptic proportions, traces of which can be detected on both poles. For the territory of El Salvador it must have had devastating consequences, rendering much of the area uninhabitable for several decades. Whether the post-Ilopango cultures are direct descendants of the pre-Ilopango peoples remains to be verified. Andrews attributed the Late Preclassic / Early Classic Uapala phase at Quelepa to the Lenca whom he sees as producers of the Preclassic Usulután pottery (Andrews 1976: 181), although Ashmore recently (2014) has shown how shifts in built environment attest to a profound change of cultural templates between the Uapala and Shila phases.

Sharer (1978, 30-42) presented a case for the existence of a Middle Preclassic village in Chalchuapa (El Trapiche and Casa Blanca), but he admitted that the Tok and Colos sherds in monumental context come exclusively from the cores of structures, and are mixed with later, Late Preclassic ceramics (Sharer 1978, 71-74). Demarest did not detect cultural remains earlier than those dating to the Late Preclassic at Santa Leticia (Demarest 1986: 39-44). San Andres yields very limited evidence for Preclassic complex society (Ichikawa 2017: 47). One exception to this pattern may be El Carmen, an exclusively Early Preclassic agricultural village investigated by archaeologists (Demarest et al. 1989); that said, one anonymous reviewer of an earlier version of this paper pointed out that he has first-hand knowledge about rather numerous examples of Late Classic traits around the site that were somehow excluded from the final report and the subsequent monograph. Another early site is Antiguo Cuscatlan, where Paul Amaroli found Middle Preclassic burials during his emergency intervention at a construction site (Amaroli 1987b). However, no secure evidence for Middle Preclassic monumental architecture has been recovered from El Salvador sites so far, and the cultural significance of public structures from the ensuing Late Preclassic is understood only slightly better.

At the same time, one cannot ignore the evidence, albeit mostly not from primary archaeological contexts, that during the Middle and Late Preclassic times El Salvador was apparently the arena of an intense intra-, and intercultural dynamics. A growing number of “Olmecoid” sculpted forms from the western portion of the country show at least passive participation (i.e. reception, if not contribution) in the pan-Mesoamerican network of cultural exchange. The famous “Piedra de las Victo-

rias,” a multi-ton monolith carved on all four sides with representations of walking or sitting personages, constitutes the ultimate proof that the exchange was not limited to simple trade of exotic goods (Sharer 1978: 157-158). Such non-portable items must have been either commissioned by local elites as manifestations of their status, or imposed by external powers as a display of their influence. In either case, they point to western El Salvador as a member of a “Mesoamerican interaction sphere” (see Freidel 2019). An interesting concept is proposed by Federico Paredes (2014) regarding the Jaguar-head artefacts found in various places within western El Salvador. He argues that, while maintaining its local coherence, the Jaguar-Head Nuclear Zone was connected to the exchange network influenced by Izapa. This idea fits with a larger cultural concept, most often referred to as the Southern Maya Region (SMR). This is a theoretical construct encompassing the Highlands, the piedmont, and the Pacific coast from the southeastern Chiapas all the way to western El Salvador. Despite its rather unfortunate name it is thought to comprise multiple ethnic and linguistic groups, of which “the Maya” would be the predominant one. Preclassic western El Salvador, in the proposed model, was part of the SMR, which in turn may have played a crucial role in the development of Classic Maya civilization (see Love and Kaplan 2011; Kaplan and Paredes-Umaña 2018).

In the opposite end of the country, at Quelepa, Andrews reported modest findings of the Middle-to-Late Preclassic Uapala phase (Andrews 1976: 179). However, the three so-called “altars” discovered in secondary contexts in different parts of the site are distinctively Izapan in style. Their obvious non-portability, again, makes the case for Quelepa elites participating in either the Izapan / SMR, or broader Mesoamerican interaction spheres, however they may be defined (Ashmore 2014; Sampeck 2014; Love 2011).

Beyond those very general connections, the scarcity of primary data from the Middle and Late Preclassic (ca. 900 BC - AD 250) and Early Classic (ca. AD 250-600) hampers attempts at reconstruction of cultural dynamics in El Salvador before the Ilopango eruption. This problem is all the more acute when one considers the fact that it was precisely during those fifteen centuries before the Late Classic that Mesoamerica became a distinctive cultural unit. The nature of those processes is arguably even more crucial along the Mesoamerican “boundaries” than at its geographic core. If we want to truly grasp the meaning of “Mesoamerican-ness”, we need to study it at its edges. Naturally, one has to always be conscious of the artificial, modern genesis of this cultural division that is a mere approximation of ancient reality, based as it is on limited information. The purpose to flesh out the identities and cultural dynamics, though, requires employment of some general intellectual constructs that give shape to otherwise ethereal elements of human cultural behavior.

There certainly are more reasons behind the inability of Salvadoran archaeology to grow out of its puberty, including distortion or manipulation of the past by Colonial and later political actors, and also because of a decade of civil war that rav-

aged the country in the 1980s and 1990s, and which rendered archaeological work almost impossible. From a purely academic vantage, I consider the three factors mentioned above to be the most severe of all. Nevertheless, while we have no choice but to accept the reality of the first two factors, we do have the capability to make the third work to our advantage. The paucity of Preclassic data with controlled, secure provenience makes for an opportunity to select sites and design excavations in a way that will help to fill that void.

The fact is, important questions lacking answers are many. What was going on along the southeast of Mesoamerica when the cultural entities were emerging and individuating? How sharp, or how smooth, were the cultural divisions? Did they exist at all? Were the societies living along the cultural transition zones aware of their “peripheral” or “transient” position? How did they describe themselves in relation to their neighbors to the northwest and southeast? Did they form a transition-zone cultural sphere? How do they relate to societies that inhabited the post-Ilopango landscape?

### **San Isidro, Sonsonate: a key to the Preclassic?**

From the relatively few Salvadoran sites that may yield undisturbed Preclassic information, only a handful have been properly investigated. Among these latter, the large-scale projects at Chalchuapa and Quelepa were conducted before the wide accessibility of the Accelerator Mass Spectrometry (AMS) that makes radiocarbon dating narrower and more reliable (Andrews 1976; Sharer 1978; Gove 2000). Because archaeological excavations are necessarily destructive in nature, the original sealed contexts of the excavated structures were lost. Nevertheless, at least at Chalchuapa, new efforts are still being made to understand that site’s past (Ito et al. 2003; Ichikawa et al. 2009; Ito and Shibata 2013).

San Isidro stands out among the still-unexcavated sites that exhibited some Preclassic material during survey. It is located in the northwestern portion of the department of Sonsonate, just below the southeastern slopes of the “Three Volcanoes Complex” (Santa Ana, Cerro Verde, and Izalco), and just south of the rim of the lake-filled caldera of Coatepeque. The site was first reported after two brief visits by Salvadoran archaeologists in October 1980 and November 1981, who noted the existence of three large and two smaller mounds located on a sugarcane field some 800-900 m apart from each other (Boggs 1981). It is significant that both of those visits took place late in the rainy season, when the cane had grown to its greatest heights, effectively obscuring the view to survey. Nevertheless, the ubiquity of Preclassic sherds was noted on the survey logs. Fowler, Amaroli and Arroyo visited the site in 1988 when surveying the Izalco area, but their activities remain unpublished. In 1996, Oscar Picardo Joao from the Universidad Francisco Gavidia attempted to draw a sketch map of the site and describe the pottery. His efforts were published

on the online journal, *Theorethikos* (Picardo 1998); however, the illustrations are lost (Picardo, personal correspondence 2017). A ceramic study of the Izalcos area, conducted by Kathryn Sampeck, encompassed San Isidro, generally confirming its Preclassic dating, but also reporting a localized, limited Late Classic occupation (Sampeck 2007).

I visited the site first in 2017, noticing from the paved road branching off from the Armenia-Sonsonate highway towards Cerro Verde and Coatepeque, three out of the originally reported four mounds. I inquired at the local San Isidro agricultural cooperative, which manages these lands, and obtained permission to survey the terrain. However, the southernmost mound, the second largest in the vicinity, is located on fields owned by another cooperative, which has its administrative seat in the town of El Sunza. There, I was unsuccessful in obtaining the necessary permissions. Eventually, however, the landowners let me and my team pass through and take photographs, but without employing other methods of surveying (e.g., with a total station), or collecting pottery. Initially I did not perceive this as a problem, as much of the archaeological site seemed to be located on the San Isidro lands.

The survey was initiated in 2018 by the team consisting of scholars from the Salvadoran Ministry of Culture, the Francisco Gavidia University, and one independent researcher, as well as myself as a project director. We selected the month of April, when the risk of rains is minimal, and the fields are mostly clear of vegetation. In order to make an effective use of the modest funds at our disposal, we employed a methodology of mixed ground-and-aerial mapping of the most prominent features. Using a DJI Mavic Pro drone, and a series of total-station-mapped Ground Control Points (GPCs), the team executed several series of flights around the visible mounds, of which we counted at least 20, taking a total of 2,049 photos. We also collected separate sherd samples from each of the flight locations. The only exceptions to this sampling were two areas on the El Sunza lands, where we could not employ the GPCs, nor gather ceramics; only drone flights were performed there. All of the photographs were processed using the Agisoft PhotoScan Pro software, and converted into Digital Elevation Models (DEMs). When studying the models, it became apparent that some regular features are too subtle to be perceived from the ground, appearing only on DEMs and orthophotomosaics. The result of the 2018 season was a preliminary map showing discrete concentrations of mounds dispersed over an area of ca. 2 square km, and some initial pottery dating based on the surface collection. Most of the sherds were non-diagnostic (primarily due to an advanced erosion), but those that were (ca. 11 %), exhibited exclusively Preclassic features, with particular emphasis on Tok and Colos (early Middle Preclassic) and Caynac (Late Preclassic), with rather modest Kal (late Middle and early Late Preclassic) presence throughout the site (Szymański *et al.* 2018). Furthermore, during my unsuccessful visit to El Sunza, I was shown a private collection of figurines and vessels. The owner without hesitation separated those coming from the area of San Isidro from those

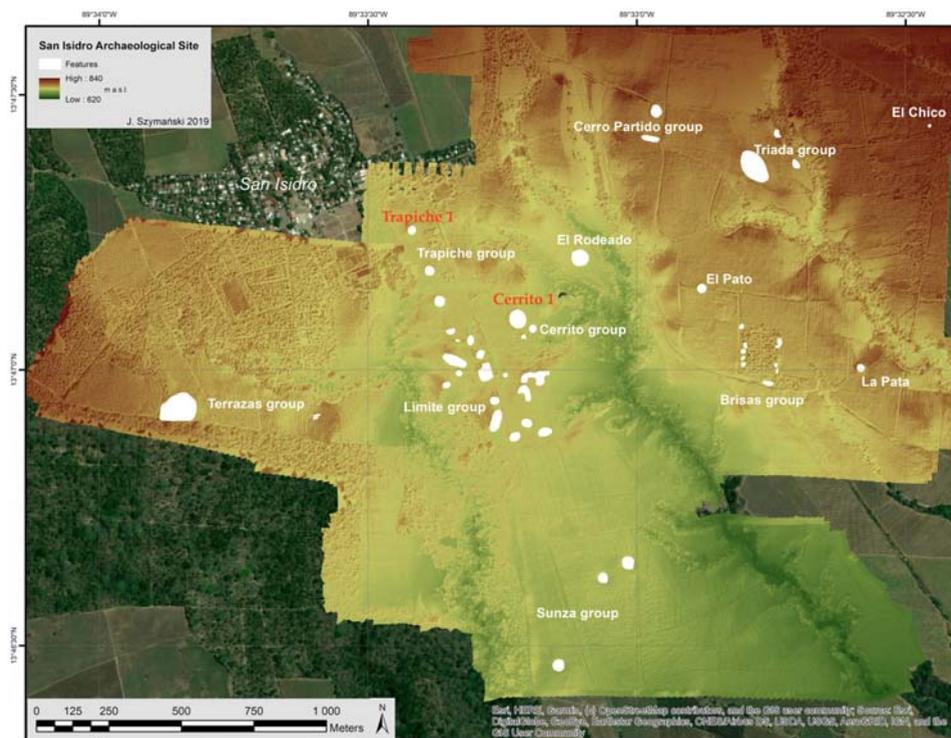


Fig. 2. A DEM-based map of the site of San Isidro (J. Szymański).

that, according to him, come from a clay pit several hundred meters south of the town of El Sunza, which itself lies ca. 2 km south of the southernmost mound at San Isidro. The ones allegedly coming from San Isidro were distinctively Preclassic, while the ones from the south appeared to be Early and Late Classic.

In 2019, we decided to focus on filling the empty spaces between the previously mapped areas. During the first stage of the survey the team used the same DJI Mavic Pro drone as before. However, due to its limitations, and because of the large survey area, we decided to switch to more professional equipment. Thanks to the generous support of Eng. Mario Ruiz, the Rector of the Universidad Francisco Gavidia, the team was provided a DJI Phantom 4 RTK drone coupled with a DJI D-RTK2 ground station. After two weeks of flights, we obtained more than 7,000 georeferenced photos of high quality, covering an area of ca. 6 square kilometers. As before, we processed these photos into orthomosaics and DEMs, this time with the Agisoft Metashape Pro software (a successor to PhotoScan), producing a map showing a spatial distribution of at least 40 visible mounds forming clusters (Fig. 2). While I do acknowledge the rather arbitrary character of such clustering that results from our ability to see only some of the ancient structures, and which, in reality, may have covered the area in a continuous fashion, I still employ the characteriza-

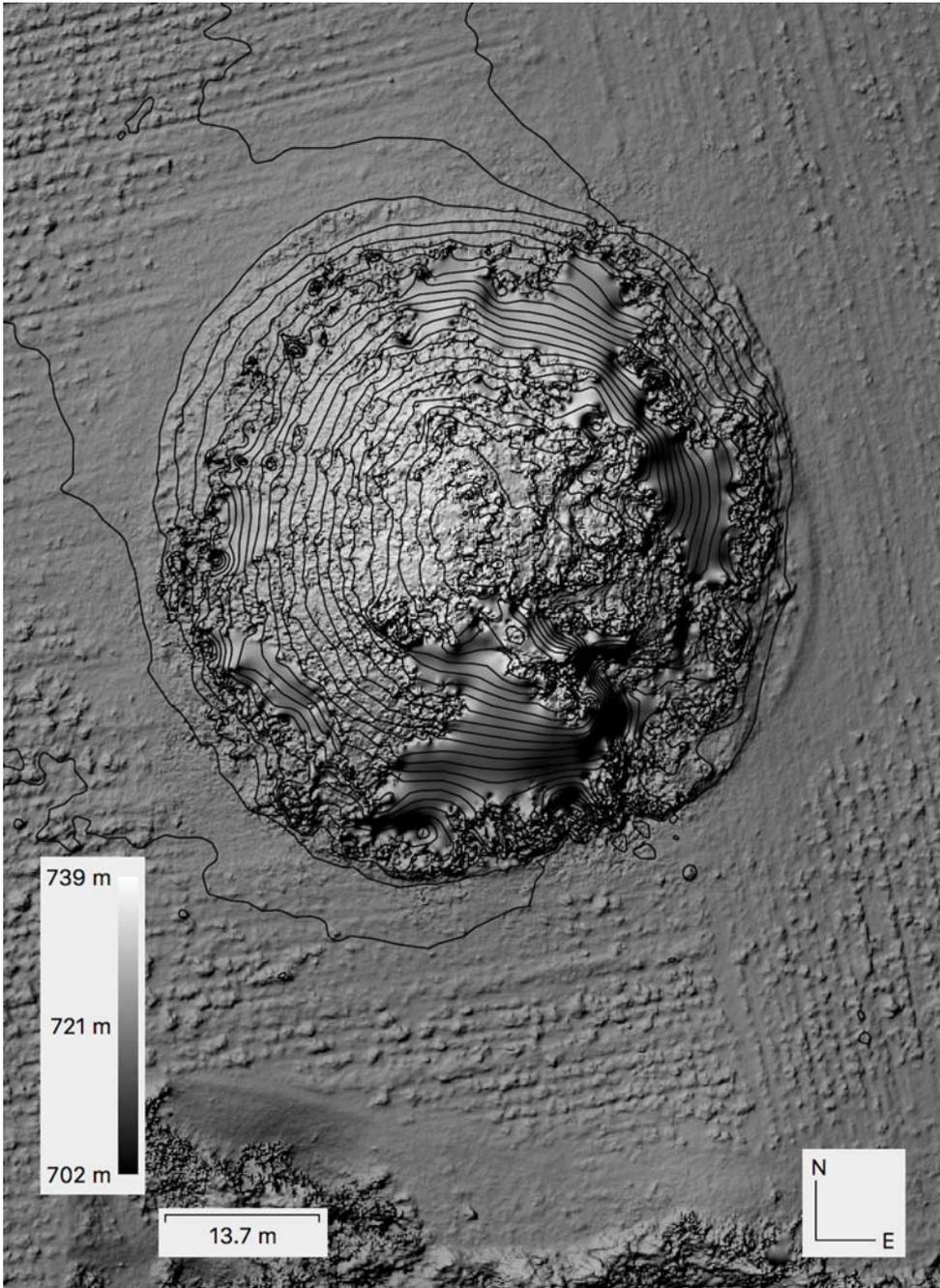


Fig. 3. Digital Elevation Model of the highest mound at the site, locally known as El Cerrito (Author).

tion, “architectural groups,” for the sake of descriptive clarity. The most prominent two mounds, Cerrito 1 (Fig. 3), and Sunza 1, measure 13 and 10 m in height and 60 and 35 m in diameter, respectively. The smallest are barely perceptible, with elevations of only 0.2 - 0.3 m above ground surface, and measuring no more than 2 x 4 m. No visible stones have been documented on or around any of the mounds, indicating clay, mixed soils, and adobe as the primary construction materials. However, at two locations within the Trapiche and Límite groups, we encountered large, rectangular stone slabs that may have been fallen stelae. As far as we could see, none of these bear any decoration. We surmise they were probably pulled by a plough and left close to their original positions (Fig. 4).

While the largest mound, Cerrito 1, is located on the San Isidro property, the greatest concentration, possibly the center of the site, and the second largest mound, Sunza 1, lie within the El Sunza jurisdiction (Fig. 5). This may pose additional difficulties in further research due to the cooperative’s reluctance in giving us permission to work there.

At least three deep canyons divide the site, separating some of the outlying groups or isolated structures from the center. Of course, at the current stage of research I cannot be sure that the peripheral structures coexisted temporally with the center, although a rather uniform distribution of sherds from different phases throughout the site suggests that such was the case. We also do not know whether the canyons were contemporaneous with the site, or appeared later. In their current form they are impossible to cross even during the dry season, and during the wet season they are converted into whitewater streams draining relatively very large catchment areas of the entire plantation (San Isidro cooperative secretary, Jonathan Romero, personal communication 2019). If they indeed existed in Preclassic times, the inner circulation within the site must have been quite complicated (Fig. 2).

An interesting observation was made during a visit to the Las Brisas community, a modern hamlet in the eastern portion of the mapped area, between the central and eastern canyons. Almost all of the twenty households possess remains of low mounds in their yards. Upon inquiry, three local, elderly residents confirmed that when they settled here some forty to fifty years earlier, the mounds were already there, and they were somewhat larger. Some have been partially destroyed to level the plots, and others have been cut in half to facilitate wheelbarrow traffic. An unknown number of structures may once have existed here. Currently, between ten and sixteen may be seen, but we must assume that some of the smaller ones once were longer mounds. Very few sherds have been recovered there, all of them non-diagnostic. However, Sampeck and Earnest visited the area and discovered a Late Classic settlement to the east of the known Preclassic structures, reportedly surrounded by deep canyons (Sampeck 2007).

In the extreme western portion of the mapped area, just south of the modern town, a succession of relatively regular terraces seem to be descending toward



Fig. 4. A large (ca. 160 x 70 cm) stone monument with one flat side, found near the top of a structure within the Trapiche group (R. Cea).

the east. It remains to be verified whether they are natural or artificial. However, at least two mounds appear in the narrow open area. In general, to the north and west of the town there are coffee plantations that are mostly covered with thick artificial forests of shade trees, rendering the actual terrain forms inaccessible for simple aerial photography. Future employment of lidar technology could help to surpass this obstacle, however.

There seems to be a North-South axis of mound distribution in the site core (groups *Límite* and *Trapiche*), with a ca. 19.5 grade Azimuth, which generally corresponds with the inclination of the whole area, gently descending from the northwest toward the southeast. Such an axis, if confirmed, would align toward the Three Volcanoes Complex. It is worth mentioning that today's landscape may be significantly different from the ancient one in San Isidro. First of all, the Izalco parasitic cone, the youngest of the three, is generally believed to have emerged within a shockingly short period around AD 1770, remaining hyper-active since its birth until the second half of the twentieth century (Carr and Pontier 1981). Paul Amaroli treats the late date of Izalco emergence with suspicion, arguing that the meticulous Spanish descriptions of the land during and after the Conquest would certainly mention the activity of a volcano, when, in fact, there is no mention of such (Amaroli 2015: 21-25). I concur with this skepticism, which I believe is further supported by the fact that in the Hack Atlas, created after 1698 but prior to 1770, two sharp conical mountains are marked

in the area, one called “the Hill of Sonsonate,” and the other “the Hill of Isalcos,” with an unnamed, rounded, lower peak shown between them, which may be Cerro Verde (see Sampeck 2014 for reproductions). Moreover, even volcanological studies base the late 18th-century dating of Izalco’s emergence purely on historical accounts, admitting that a complicated sequence of overlapping lava flows hampers precise absolute dating (Carr and Pontier 1981: 279-284). That being said, the Izalco cone most certainly appeared long after the Classic period, which ended ca. AD 900. During San Isidro’s lifespan, there most likely have been just two rather than three volcanoes on the site’s northwestern horizon. The damage to local populations and archaeological sites caused by Izalco’s emergence must have been immense, and it probably affected San Isidro’s northwestern limits. Moreover, another alteration of the landscape may have directly changed the spatial context of the site, namely, the historically registered lava flow of San Marcelino, in 1722 (Carr and Pontier 1981; Black 1983). This flow created a four-meter-high plateau of black volcanic rock extending from the slopes of Cerro Verde all the way toward the central Valley of Zapotitán, effectively burying any potential settlements related to San Isidro (Fig. 6).

The sheer spatial extension of the site makes me believe that it was one of the most prominent centers in Preclassic El Salvador. If this is the case, the center might have controlled a significant territory located at a crucial junction of communication routes. One look at the elevation map of the country makes it clear that San Isidro occupied a strategic position within a narrow corridor connecting entrance to the Valley of Zapotitán to the east with the easiest approach inland from the ocean at Acajutla to the southwest. With such an advantageous geographic setting it likely would have benefitted from both long-distance maritime and regional overland trade.

Given the incomplete and accidental nature of the surface collection of ceramic samples, and thus only a very preliminary San Isidro chronological framework, I feel that it is too early to speculate about the site’s active lifespan and the particular connections and relations between it and neighboring sites. In the most general terms, however, it seems that the ancient inhabitants of this area were already in place by the Early to Middle Preclassic transition, around 1000 BC. An absolute lack of Classic diagnostic sherds suggests that the center may have not survived the wider Mesoamerican crisis occurring approximately AD 250, although whether the Ilopango ash fell on an abandoned ghost-town, or a living city, is currently unknown. There is some, albeit limited, evidence that settlers returned to San Isidro sometime during the Late Classic (Sampeck 2007).

If settlement size can be used as an indicator of political power, one may assume that, during Preclassic times, San Isidro had few peers among its neighbors. Chalchuapa certainly existed and prospered at this time, and at least from the Late Preclassic on, so did Tacuscalco, although the latter center was most likely rather modest in size before the fall of San Isidro. Whether the growth of the former was related to the abandonment of the latter remains unknown. Further into the Za-

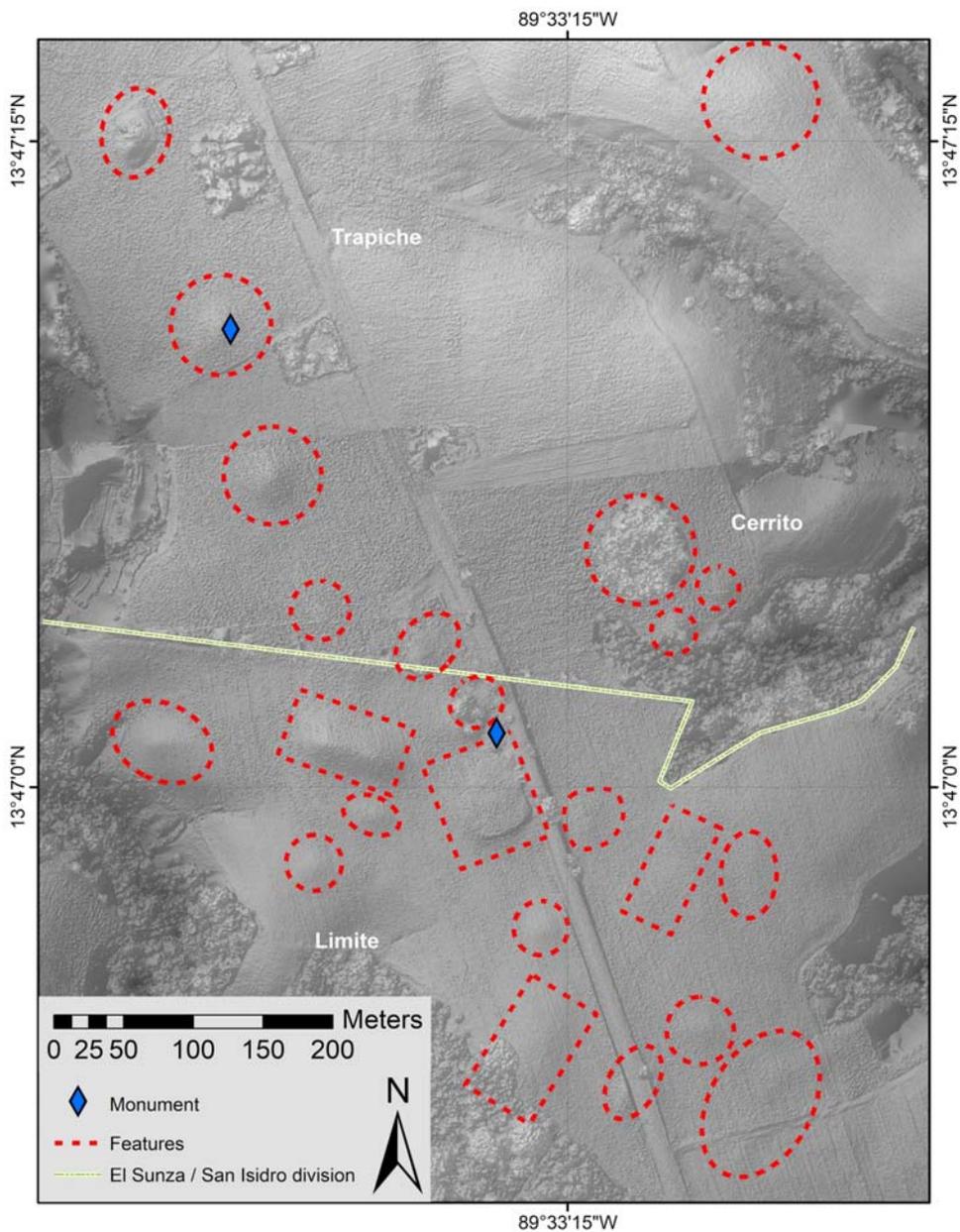


Fig. 5. DEM-based map of the presumed center of the site (Author).



Fig. 6. Edge of the San Marcelino lava flow from the eighteenth century AD just beyond the northeastern corner of the mapped area, view towards northeast (Author).

potitán Valley, some Preclassic activity was detected both in San Andres, and in Joya de Ceren (Ichikawa 2017; Paul Amaroli, personal correspondence, July 2019; Michelle Toledo, personal communication, April 2019). However, as with Tacuscalco, these were most likely small settlements. One other Preclassic site may have rivaled both Chalchuapa and San Isidro, but its exact size will most likely never be known. This site currently is known by at least four different names: Santa Teresa, Finca Rosita, Finca Arizona, and Finca San José, and it most likely formed a single Middle-to-Late Preclassic settlement now mostly destroyed by the urban sprawl of the modern city of Santa Ana (Genovez 2013).

Some of the currently unexcavated but otherwise registered sites in Sonsonate and other neighboring departments of El Salvador may in the future prove to be of the same or greater antiquity and size as San Isidro. As mentioned before, it is also possible that some archaeological sites, even of substantial size, may have been entirely destroyed and / or buried during one of the many volcanic events that happened since the Preclassic, especially by the activities of Izalco and a lava flow from San Marcelino.

Accepting such limitations in the ability to reconstruct the ancient history, size, connections, and social and cultural dynamics of the southeastern extreme of Mesoamerica, nevertheless, I strongly believe that San Isidro may provide us with crucial data for understanding several aspects of the boundary zone, which remains such a question mark. First and foremost, I hope to find information that would help us link the data from the two best-known Middle and Late Preclassic sites: Quelepa in the east, and Chalchuapa in the northwest. Given the fact that Chalch-

uapa is relatively landlocked, on a plateau surrounded by mountains from the north, west, and south, its access to maritime trade routes would most likely involve the Acajutla-San Isidro-circum-Coatepeque route. On the other hand, comparably to San Isidro, Quelepa is located in the narrow point of an otherwise broad valley that leads inland from the Jiquilisco Bay and the ocean. Since it is known that it had access to cultural patterns from both Mesoamerica and Lower Central America, one may expect a somewhat similar situation at San Isidro, or perhaps a mirror reflection of fluctuating exchange patterns.

Absence or presence of cultural traits such as Izapa-style, or Usulután pottery, as well as provenience of the lithic material at San Isidro will potentially shed light on an early interregional transition zone node of an emerging exchange network that, apart from portable goods, had apparently transmitted some mental templates as well.

## Conclusions

The archaeological research hitherto undertaken in El Salvador does not – yet – translate into any even barely adequate understanding of its past. Limited accessibility of archaeological remains due to dense urban and rural development, in addition to an unknown number of sites destroyed by constant volcanic activity, results in the existence of discrete islands of fairly complete data separated by archaeological voids. Our inability to connect those separate dots is further caused by their uneven chronological distribution. The Postclassic data can be partially accumulated and corroborated by Colonial sources, and by linguistic data. However, the earlier the phase, more chance the data was destroyed or obscured by volcanism. Any protohistoric accounts of ancient Salvadoran societies from the neighboring literate Maya of Guatemala and Honduras are so far unknown.

Although so widely accepted as a concept, Mesoamerica has never been precisely defined in terms of its geographic boundaries. We are far from certain whether its inhabitants, even only those of an elite status, perceived themselves as members of any coherent cultural sphere. We do not know either whether clear affiliation with Mesoamerican cultures or even affiliation with the so-called Southern Maya Zone, or whatever modernly-conceived cultural division we employ, simply faded away, gradually becoming something else, or abruptly ended at an identifiable geographic feature, such as a river or a mountain range. One of such proposed sharp lines is the Lempa River that cuts off the easternmost third of the country from the rest, but as Haberland once remarked, such broad, navigable rivers with fertile banks more often than not formed internal communication routes than ethnic, political, or cultural divisions (after Bruhns 1996: 286-287).

Mesoamerican scholars still have not unambiguously isolated any set of archaeologically detectable traits that would ultimately ascribe a site, region, or culture,

to Mesoamerica. Even ball courts, traditionally considered to belong to Mesoamerica since Kirchhoff, are now reported from areas usually thought to have been outside of it, such as Mosquitia (Fisher et al. 2016). Linguistics do not seem to be holding the answer to the matter, either. Campbell emphasizes that languages do not necessarily overlap with cultures or ethnic entities, something that is well exemplified by the multitude of ancient Mayan languages, existing within a single, fairly homogeneous civilization (Love and Kaplan 2011, Campbell 2015). Hoopes and Fonseca (2003) have successfully introduced the term, “Isthmo-Colombian Area,” which replaced the former “Intermediate Area,” which used to denote the string of countries to the south of Mesoamerica and north of South America. However, their definition of a new cultural zone, in principle, uses the distribution of a “Chibchoid” linguistic family as a limiting factor, thus leaving out a narrow zone of eastern El Salvador as well as portions of Nicaragua and Honduras. That region is not traditionally included in the “real Mesoamerica” either, at least not until its southward expansion after the arrival of the Pipil in the Postclassic times. What should we do with this true “Intermediate Area,” considered a buffer zone between Mesoamerica and the Isthmo-Colombian Area? Was it part of one area or the other at any time? Or should we accept, grudgingly, that we will never find a neat, clean and elegant definition that will separate Mesoamerica from Lower Central America, simply because it never existed? In any case, we shall also expect that those boundaries, however defined, would have certainly shifted through time.

Many of these questions must remain unanswered simply until more data has accumulated. However, I am convinced such answers will eventually be found. With the current pace of archaeological innovation, I believe my optimism is warranted. In the meantime, further investigations at the site of San Isidro will hopefully reveal at least a small bit of the unknown.

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