

# The PARI Journal

A quarterly publication of the Ancient Cultures Institute Volume XIX, No. 2, Fall 2018

In This Issue:

A Preliminary Analysis of Altar 5 from La Corona

by David Stuart Marcello Canuto Tomás Barrientos and Alejandro González

PAGES 1-13

•

In Memoriam: Alfonso Lacadena García-Gallo

> by Marc Zender PAGES 14-20

Marc Zender
Editor
marc@ancientcultures.org

Joel Skidmore Associate Editor joel@ancientcultures.org

The PARI Journal 202 Edgewood Avenue San Francisco, CA 94117 415-664-8889 journal@ancientcultures.org

Electronic version available at: www.precolumbia.org/ pari/journal/1902

ISSN 1531-5398

## A Preliminary Analysis of Altar 5 from La Corona

David Stuart Marcello Canuto Tomás Barrientos Alejandro González

Excavations during the 2017 and 2018 field seasons at La Corona, Guatemala, revealed a limestone relief sculpture bearing the portrait of a seated lord with an accompanying hieroglyphic text (Figure 1). It was discovered set into the floor of an early platform in front of the architectural complex known as the Coronitas group, one of La Corona's most important architectural complexes. We call this new monument Altar 5 in the designation system of La Corona's sculpture (see Stuart et al. 2015). The monument bears an inscribed Long Count date of 9.5.10.0.0, firmly placing it in the year 544 ce, making it the earliest dated sculpture thus far recovered from the site. The sculptural style matches a mid-sixth century placement, around the transition of the Early to Late Classic periods in ancient Maya chronology.

The inscription also allows us to identify the portrait as that of an early local ruler named Chak Tok Ich'aak, named as the protagonist in the accompanying hieroglyphic text as well as through hieroglyphic elements incorporated into his headdress. He is shown from the side, facing to the left, seated cross-legged atop a basal register that represents a toponymic hieroglyph (we discuss this in more detail below). Across his midsection he holds a ceremonial bar, and from the serpent maws at either end emerge the heads of two deities or ancestral beings. Although there is some damage to the sculpture, especially in the area of the ruler's face and arm, much of the carving is in excellent,

even pristine condition, with remains of red paint. As the inscription makes clear, the altar is a monument commemorating Chak Tok Ich'aak's participation in a calendar ritual in the year 544 CE, on the occasion of a k'atun's half-period. Here we will discuss some important details about this ruler and his connection to the wider political world of the Maya lowlands in the sixth century.

#### **Archaeological Context**

Altar 5 was discovered during investigations into a small structure, Str. 13R-45, located immediately to the west of the pyramid of Structure 13R-2 in the Coronitas Group (Figure 2). It was found buried under the collapsed roof and walls of Structure 13R-45. Nevertheless, a thin layer of fine dirt covered the altar relief, protecting it against the fallen debris.

The purpose of these excavations (Operation 112) was to investigate whether an accumulation of architectural debris located to the west of Str. 13R-2 represented a collapsed building. Since the area had been greatly disturbed by the presence of a large ramon tree and the deposition of a large backfill pile from earlier looting activity, excavation was needed to reveal the architectural articulation of this corner of the Coronitas group. Initial excavations began in 2016 with limited test excavations by Jocelyne Ponce that uncovered evidence of steps of a low platform (Ponce 2017). These excavations suggested that



Figure 1. Altar 5 of La Corona (photo: David Stuart).

there existed some type of construction immediately to the west of Str. 13R-2. In 2017, excavations by Alejandro González, Sidney Coates, and Antonieta Cajas not only confirmed the presence of a small formal structure, but also discovered Altar 5 in its interior (González Córdova and Cajas 2018). The monument was left in its original context until the 2018 field season, during which the large ramon tree was carefully removed allowing Alejandro González to complete the excavations.

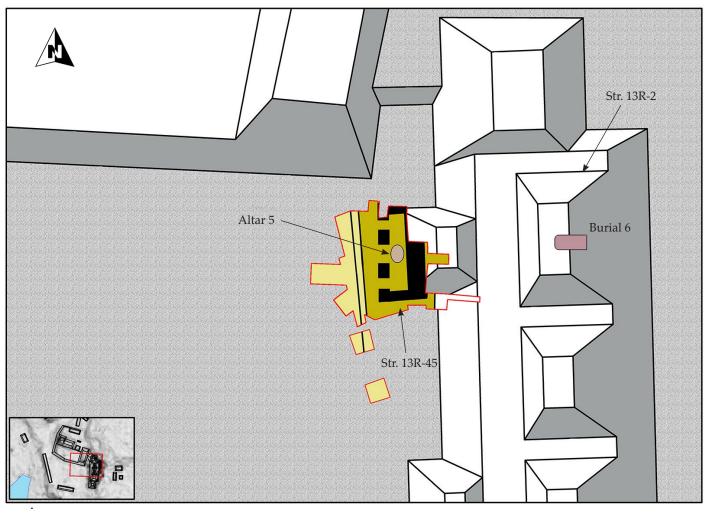
The 2018 excavations revealed that Structure 13R-45 was a small vaulted stone masonry temple with three doorways facing west delimited by two square columns (Figure 3). The interior area is a narrow single chamber

measuring ca.  $7.5 \times 1.8$  m. Furthermore, Str. 13R-45 had no exterior façade on its eastern side. We therefore suggest that this building was abutted to the basal platform of the funerary temple Str. 13R-2 of the Coronitas Group. Stratigraphic data indicate that this building was constructed after the altar had been installed. Excavations showed that the altar was originally installed in a cut made into the exterior floor located to the west of Str. 13R-2 and its basal platform. Before the altar was placed in the floor cut, moreover, 14 fresh water bivalve shells were clustered in what appears to be a preparatory cache. No other artifacts were found within this floor cut.

It is possible that this open-air spot represents the

altar's original location. Nevertheless, because the altar suffered damage to its carved surface, it seems equally plausible that it was first installed elsewhere and then later relocated to the front of Structure 13R-2. Nevertheless, for the moment it remains unclear how long the altar remained in this open area once it was installed in the floor cut. Eventually it was covered by Str. 13R-45, and two additional floors were laid around it. One important detail of both Structure 13R-45 and Altar 5 is their location along the main axis of Structure 13R-2. Previous excavations by Joanne Baron (2012:238-248) found a tomb (Burial 6) behind Structure 13R-2-Sub-2. Although the occupant of the tomb has not been identified, the presence of thousands of chert flakes atop its roof as well as a matimpressed interior ceiling suggest that its occupant was a ruler. Furthermore, the contents of the tomb included 14 monochrome ceramic vessels and one small bichrome vessel, plus various species of shell (some identical to the ones found cached below the altar) and the remains of a crocodile and a turtle. Radiocarbon and ceramic analysis date this tomb to the mid-sixth century CE, corresponding to the date of Altar 5. However, when compared to other contemporaneous royal tombs at nearby El Peru-Waka', this tomb indicates that La Corona was a modest site whose rulers had meager access to prestige goods at this time.

The construction of Structure 13R-45 around Altar 5, in front of Structure 13R-2 and near the rest of the Coronitas Group's other funerary temples, suggests that this building had a largely ceremonial function. Evidence of burning in some areas of the altar also suggests that the monument and the interior chamber of Structure 13R-45 were the focus of ceremonial activities, probably related to ancestor worship represented by the Early Classic tombs of the Coronitas temples and the portrait on Altar 5. In addition, artifact concentrations throughout the interior of the chamber evince that such ceremonial activities took place throughout the eighth century CE as this shrine sustained its importance long after the altar was installed.



**Figure 2.** Map of La Corona (inset), with detail view of the Coronitas Group and Operation 112: Structure 13R-45 and Altar 5. Cartography: Marcello A. Canuto.

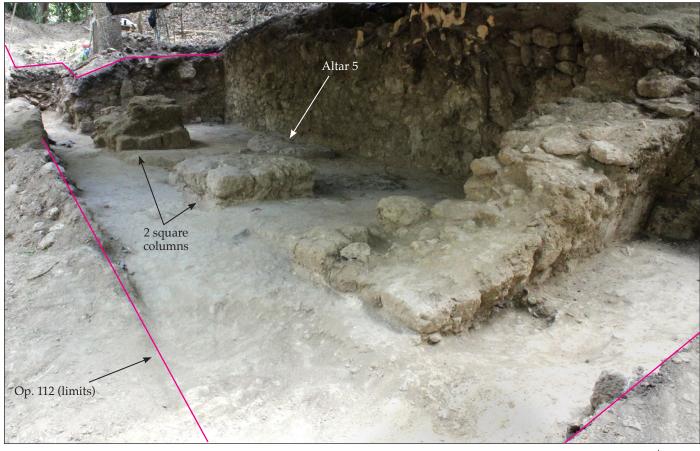


Figure 3. View of Altar 5 in situ (photo: Alejandro González).

### 0 0.5 1 1.5 2

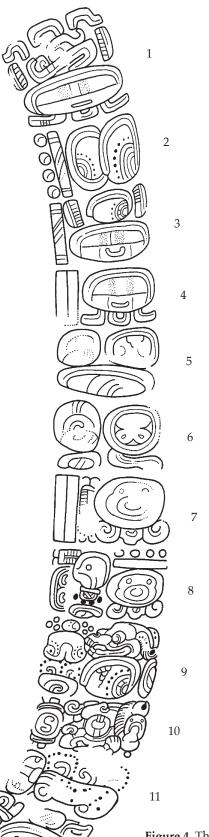
#### The Inscription

A band of hieroglyphs was carved along the altar's right edge, behind the ruler's back, slightly curved to conform to the irregular shape of the stone (Figure 4). The text shows twelve incised glyphs in excellent condition, presenting a Long Count date and a simple sentence with a verb and subject. The date is 9.5.10.0.0, running from blocks 1 through 6. The opening hieroglyph in the Initial Series Introducing Glyph shows the expected month patron of Zip (10 Ahau 8 Zip being the Calendar Round station of the Long Count). The Long Count itself seems unremarkable in most respects, save for the unusually large -li affix on the Uinal glyph in Block 5. This might be best explained as an oddly placed part of the "zero" that is prefixed to the Uinal, replicating the sequence of two signs we see as a prefix to **K'IN-ni** in the following block.

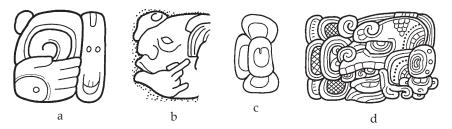
Both of these "zero" forms are most likely spellings of MIH-li, for *mih-il*, "nothing" (note Ch'olti *mihil*, "en balde o de balde [for nothing]" and proto-Mayan \**mi*(*h*), "nadie, ninguno" [Kaufman 2003]). Identical forms appear from time to time in Long Count dates at other sites, using a "shell-hand" element with a li suffix

(Figure 5a). The head variant of this shell-hand shows a human profile with a hand over the jaw—a death-related character from Maya mythology (Schele 1987)—and it is probable that the two share a common graphic origin, the lower hand being a strong indication (Figure 5b, see also Figure 12). These forms can functionally overlap with the more familiar "flower" or "Maltese Cross" form of zero (Figure 5c) that is also syllabic **mi**, used in **mihi**, for the root *mi*(*h*) (Figure 5d) (see Grube and Nahm 1990; Stuart 2012). It should be noted that the shell-hand sign apparently can serve as both a logogram **MIH** and as a syllable **mi**. Curiously, to our knowledge, these

<sup>&</sup>lt;sup>1</sup> As noted, the "hand-shell" MIH/mi sign probably originated as a graphic shorthand form of the more elaborate head sign, also displaying a hand in its lower half. Over time these became graphically distinguished—a paleographic process that appears in the history of several other signs. The MIH logographic function of the sign seems implied by its use in a ritual or mythical place name written 6-MIH-NAL, Wakmihnal ("Six-Nothing-Place") or the title 6-MIH-WINKIL, Wakmihwinkil, "Six-Nothing-Person," cited on La Corona Panel 1 and in other texts. Its syllabic use is best demonstrated by spellings at Palenque of sa-mi-ya, sahm-iiy, "earlier today" (see Palace Tablet and Temple XXI bench).



12



**Figure 5.** Comparisons of Classic Mayan spellings for *mih* "zero, nothing." (a) **MIH-li**, Xupa, Panel fragment; (b) **MIH** or **mi**, Palenque, TFC; (c) **mi** from Uaxactun St. 26; (d) syllabic **mi-hi**, Copan St. 63 (drawings: David Stuart).

spellings of *mih-il* are only used to write "zero" in the context of Long Count dates, never appearing with Distance Numbers, for example, where *mi(h)* was preferable. After the Long Count record we come to **10-ta-AJAW** in Block 7, providing the corresponding point in the 260-day count, 10 Ahau. There is no mention in this text of the "month" 8 Zip, showing a rare omission in a formal text such as this (the patron of Zip in the Initial Series Introducing Glyph was perhaps a sufficient mention of the 365-day calendar). The **ta** element, standing for the preposition *ta*, "at, on," appears between the number and the day sign, conforming to a pattern we see elsewhere where 260-day records seem to describe the convergence of their two components, number and day name. Thus the meaning is *lajuun ta ajaw*, "10 *at* Ajaw," not simply "10 Ajaw." Similar forms are especially common in the inscriptions of Tonina (Figure 6). Following the lengthy record of the date we come to a description of the Long Count's station, stating its nature as a "half-period":

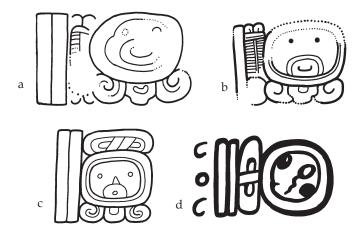
Lajuun ta ajaw (it is) Ten at Ajaw Ta u tahnlam-il baluun ajaw on the half-diminishing of Nine Ajaw

Which is to say that 10 Ahau falls on the precise mid-point of the k'atun, referred to here in shorthand form simply as "9 Ahau," for 9.6.0.0.0. This is much like the truncated names we find for k'atun periods in the colonial Books of Chilam Balam—"katun 8 Ahau," "katun 4 Ahau," and so on. So ends the long record of the Period Ending on the altar, leaving the substance of the statement (verbs and actors) for the last four blocks.

The main verb, in the first half of Block 9, is a glyph never before seen in Maya inscriptions, spelled **k'o-to-yi** (Figure 7). The final **-yi** is a strong indication that we have here a member of the class of intransitive marked by a -Vy ending (CVC-Vy), akin for example to **ju-bu-yi**, *jub-uy*, "s/he goes down." This class of intransitive typically relates verbs of movement and change of state. The initial sign (T174:530) of this verb is familiar in a number of other contexts, and one of the authors suggested some years ago that it is probably a variant of the syllable **k'o** (Stuart 2017). The Altar 5 spelling provides important new evidence in support, given its pairing with **-to-**. Simply on the basis of vowel

**Figure 4.** The Hieroglyphic Text of Altar 5 (drawing: David Stuart).

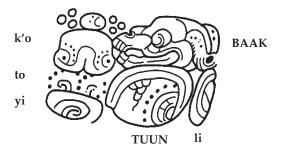
 $<sup>^2</sup>$  Stuart first considered a **k'o** decipherment for this sign in 2008, based on a substitution in a queen's name at Tortuguero (Stuart 2017). This was confirmed by the verb spelling on Altar 5 in 2017.



**Figure 6.** Records of 260-day stations showing the preposition **ta** between number and day name: (a) La Corona Altar 5; (b) Tonina M. 106; (c) Tonina M. 156; (d) Tonina incised sherd (drawings: David Stuart).

synharmony found in other spellings of this type (CV<sub>1</sub>-CV<sub>1</sub>-yi), we can be fairly confident we have a verb with the shape Cot-oy. Only one attested intransitive root in Ch'olan languages fits this pattern: k'ot, as in Ch'orti' k'otoy, "s/he arrives there." The k'o reading is thus strongly suggested by this example alone, independent of the other clues considered earlier. Taken together, the evidence indicates that k'o-to-yi is certainly the verb we have on the La Corona altar, spelling k'otoy, "he arrives there." What follows, before the subject's name, looks to be a place name written with the skeletal head variant of BAAK before TUUN-li, giving us the toponym Baaktuunil ("Bone-Stone-Place"). This would specify a place where the subject, named in the very last blocks of the text, arrived on the Period Ending.

The subject of the verb is the local ruler whose name appears in Blocks 10 and 11 (Figure 8). The initial sign in the first block is a variant form of WAK, "six," based on its occasional use as a replacement for the simple bar-and-dot form of the numeral (Schele and Miller 1986:311). The head sign in combination with WAK presents a conflation of two signs: the bird with handover-jaw that is an animated form of CHAN, "sky," as well as another head that is characterized by a jaguar ear, a missing jaw, and an OHL-like element over the eye. This combination appears in other examples of this particular royal name from Tikal and El Peru. The second of the two head signs remains undeciphered, although PAN is one possibility worthy of further testing (see below). The second part of the name is spelled with the three logograms CHAK, TOK, and ICH'AAK, giving us the name by which we commonly refer to this



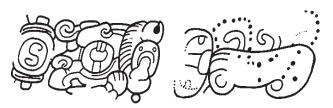
**Figure 7.** The verb phrase, using the intransitive verb **k'o-to-yi**, *k'otoy-i*, "he arrived there," followed by a probable place name, **BAAK-TUUN-li** (drawing: David Stuart).

ruler, Chak Tok Ich'aak. His full name would perhaps therefore be Wak Chan Pan(?) Chak Tok Ich'aak.

The name is also conveyed in the ruler's headdress, where we see a few of the same hieroglyphic elements in the small head-like form atop his helmet—the WAK sign, the TOK, and perhaps CHAN are just discernable in a small head at the top of the headgear. In addition, the large zoomorphic head that forms the ruler's helmet also provides the animated ICH'AAK element that we know from variant examples of this same name found in the inscriptions of Tikal (see also Figure 16a).

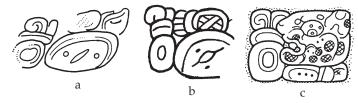
In the very last block of the text we find the title *sakwayis* (**SAK-WAYIS**), a curious term used by multiple rulers of La Corona and others at nearby centers in northern Peten and southern Campeche during the Late Classic (see Grube 2005) (Figure 9). Its meaning is unknown, but it is very common as a title for both men and women (*ix sakwayis*) throughout the region (found, for example, on numerous looted ceramics in the so-called "Codex Style"). Its presence here would indicate that Chak Tok Ich'aak carried the same designation found with later La Corona lords, and that he perhaps was a member of the dynastic line we know from more well-attested periods of the site's history.

In summary, the altar's inscription tells us that a La Corona ruler named Chak Tok Ich'aak journeyed to a place called Baaktuunil where he celebrated the Period Ending 9.5.10.0.0, in 544 CE. The identification of Baaktuunil remains unknown, but it must lie some distance from La Corona, given the unique use of the *k'otoy* verb ("he arrives *there*"). This is all highly unusual, signaling that the local ruler did not celebrate the Period Ending in a local setting but rather somewhere further



**Figure 8.** The name of the protagonist, Wak Chan Pan(?) Chak Tok Ich'aak from the inscription (drawing: David Stuart).

<sup>&</sup>lt;sup>3</sup> The animal skull variant for **BAAK** is perhaps best known from its frequent use in the emblem glyph of Palenque, where it serves as the basis for the dynastic name *Baakal* or *Baakeel*. This example from La Corona may be its earliest known attestation.



**Figure 9.** Examples of the Sakwayis title: (a) La Corona Altar 5; (b) La Corona Panel 1; (c) La Corona Element 56 (drawings: David Stuart).

afield, at another center. As odd as this may seem, the notion of a ruler traveling elsewhere for a ritual celebration seems to fit the flavor of some later La Corona texts, where we read of local lords who "went to Calakmul," to participate in ceremonies with Kaanul overlords. Altar 5 may allude to a similar type of event, although this is not to say that Baaktuunil was a place located in the vicinity of Calakmul.

#### The Basal Register

The ruler is seated atop a large animal- or bird-like head, an elaborated hieroglyphic form that provides further locational information about the presence of Chak Tok Ich'aak during his ritual (Figure 10a). Such basal registers showing large heads are common in Maya iconography, often seen under the feet of standing rulers, or else marking location in some other way (Stuart and Houston 1994:57-68). These are often amalgams of different hieroglyphic elements that provide the proper name of the place, general or specific in scope, where the event occurred.

On Altar 5 the basal head is obscured by many details of the design, but we can readily discern its nose and large eye. It wears a large circular earspool. To either side we see tendril-like forms that emanate from the head's mouth, each ending in a flower-like element bearing large ik' signs within, signifying wind or breath.4 Two other features hold important clues as to the head's identity: a human hand near the lower jaw of the head, reminiscent of the MIH sign we have discussed, as well as a comb-like feature above the earspool. Both of these are also part of the head that features prominently in the name of the king in the accompanying inscription, in Block 10. There we saw a conflation of two heads, one still undeciphered (possibly based on PAN?, "dig") and another the bird that is the animate form of CHAN, "sky." The hand and the comb-like element would seem to be two diagnostics for the CHAN logogram, and we see that many other features of the basal head are shared with it, including the hair top-knot, and the shape of the beak and eye. We suspect that the basal head is therefore also **CHAN**, in combination with other elements.

The curved tri-lobed element before the face also offers an important clue, for it is a recognizable diagnostic for the head variant for **CH'EEN**, "cave, well" and

"town." This should not be too surprising, for the combination *chan ch'een* appears throughout Maya writing and iconography as a term in association with place names. Similar combinations of animate **CHAN** and **CH'EEN** signs appear with some frequency as basal registers elsewhere in Maya art (Figure 11). The paired term "skycave" seems to describe a focal point of ritual activity, a central place defined by the vertical axis of what is above (sky) and below (cave) (Stuart 2015; see also Tokovinine 2013:38-43). In a textual setting this term usually follows the proper place name. In iconographic usage, as here, the elements of a place glyph can be fused with the **CHAN** and **CH'EEN** signs, creating a complex visual amalgam that renders the phrase "PLACE NAME, the

<sup>4</sup> For a similar presentation of a head with flanking ik' flowers, see the basal register of Naranjo Stela 46 (Martin et al. 2017). As breath elements ik' flowers also appear emanating from the skeletal snake or centipede depicted on the sides of Altar U at Copan.

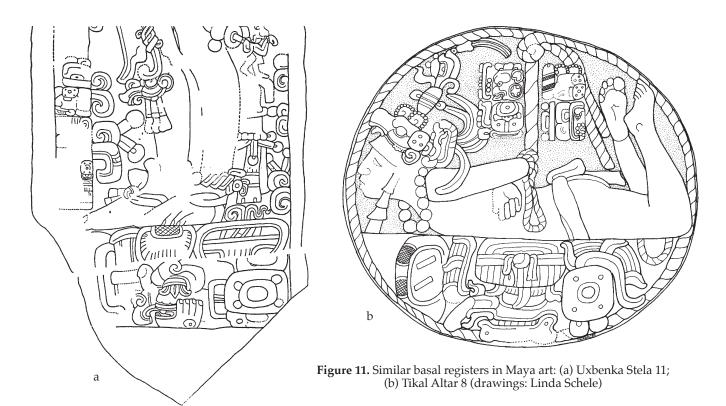
<sup>5</sup> The very tentative PAN? reading for the head sign found after CHAN in the extended name of Chak Tok Ich'aak is based on its known substitution with the "axe-over-earth" sign in texts at Palenque, Yaxchilan, Bonampak, and elsewhere. This later graphic form may depict the act of digging into the earth with a hafted hoelike tool. A common root for "dig" in lowland Mayan languages is paln, and the frequent appearance of a -na suffix on the sign as a phonetic complement may offer some support. It remains highly speculative.





**Figure 10.** Details of the basal register of Altar 5 (photos: David Stuart).

и



sky-and-cave." The circular eye of the large head shows a small hafted axe within (Figure 10b), overlaying the details of the eyelash. This is a distinctive feature of yet another hieroglyphic element, the head variant of the number 6 (see Thompson 1950:Fig. 24). This number appears as part of the extended name phrase of the ruler Chak Tok Ich'aak, but here it does not seem to point to his personal name, as no other elements of his name are present. As noted, the presence of CHAN and CH'EEN tells us that whatever other glyphic elements are present should refer to a place name. Numerous mythical and ceremonial locations mentioned in ancient Maya texts begin with the number six, and we believe this is likely to be the case here.

This all immediately brings to mind the place name Wakmihnal, cited in several La Corona inscriptions as the name of one or more shrines, probably associated with the Coronitas group. This is suggested by the mention of Wakmihnal in Panel 1, which was found in Structure 13R-5, a short distance from Altar 5, and explicitly connects this name with its architectural setting (Figure 12a). Indeed, other elements of the Wakmihnal glyph seem to be present on Altar 5's basal register: the hand over the head's jaw, in addition to being part of the **CHAN** head variant, could refer to the head variant form of **MIH** discussed earlier. Above

the large earspool is a maize-like element that strongly resembles NAL, thus providing all the necessary components. Taken together, we believe that the elaborate head upon which the ruler sits provides a conflation of multiple elements: WAK-MIH-NAL-CHAN-CH'EEN, for "Wakmihnal, the sky-and-cave." More loosely this may be understood as something along the lines of "(at) Wakmihnal, the ritual center." If correct, this would provide compelling evidence that Wakmihnal was a long-standing name associated with the larger Coronitas group.

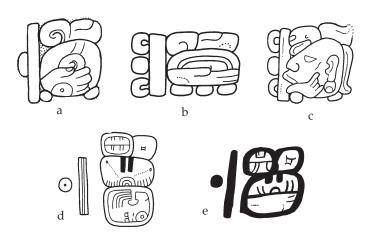


Figure 12. Wakmihnal and related glyphs: (a) La Corona Panel 1; (b) Yaxchilan HS 2, Step VII; (c) La Corona Element 19; (d) Santa Rita murals; (e) Dresden Codex, p48 (drawings: David Stuart).

<sup>&</sup>lt;sup>6</sup> In Maya art rulers are rarely ever shown seated atop their names, the obvious exception being the figures depicted on Altars Q and L at Copan, as well as several on the bench frieze of Temple 10L-16.

The mythological connections of Wakmihnal are clearly reflected in its frequent appearances outside the inscriptions of La Corona (Figure 12b-e). For example, it is cited in the important text of Step VII of HS 2 at Yaxchilan, where it is paired with the so-called "black hole" place name (IK'-WAY?-ya-NAL) in a narrative account of three sacrifices taking place in the very deep mythic past. There it is specified as the location of the third such sacrifice, all decapitations that served as the mythological backdrop for the ritual ballgame depicted in the step's scene. It is also reflected in the names and honorific title of a certain deity called Wakmihwinkil, "the wakmih person," and, in Postclassic contexts, Wakmihajaw, "the wakmih lord." One interesting example occurs again at La Corona on Element 19, where it serves as a deity title for the ruler Chakaw Nahb Chan (Figure 12c). These personalized references may well signal the deity who personifies the MIH sign or "zero" in the hieroglyphic script, discussed above—a connection strongly indicated by the juxtaposition of the same glyphic name with the image of the "zero god" on the central marker of Ballcourt IIb at Copan (Schele 1987) (Figure 13). This god's connection with sacrifice and ritual decapitation (a common theme of ballcourts) seems to reappear also at Quirigua, where Wakmihwinkil serves as a ritual title for an important person who is mentioned in Stela E's narrative of the Copan ruler's own beheading.

The prominent display of the place name Wakmihnal in the iconography of Altar 5 raises an interesting question regarding the nature of the monument's different locational references, and what might at first seem to be contradictory information. We have seen that the altar's



**Figure 13.** Central Marker of Ballcourt IIb at Copan (drawing: Barbara Fash).

inscription makes clear that Chak Tok Ich'aak "arrived there" at a place named Baaktuunil. Why two place names, one cited in the text and another in the iconography? It is important to keep in mind that these may well be two distinct "categories of place," with Baaktuunil seemingly a destination, a town or community, while Wakmihnal has a more ritual and ceremonial scope of reference, perhaps as the name of a shrine or temple. The two place names are not mutually exclusive. The situation is one we often find in Maya iconography and texts where multiple places can co-occur, some more specific than others.

#### The Deity Heads

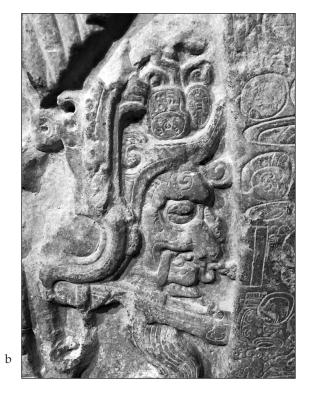
Chak Tok Ich'aak holds a two-headed serpent or "ceremonial bar" across his body. Although these are very common elements in ancient Maya iconography and royal portraiture, their symbolism and nature as ceremonial objects (either figurative or real) has not been studied in great detail. The body of the "bar" is often composed of mat designs (as here), crossedbands, or sky-bands. At the two ends are large circular "flares," reminiscent of smaller jade jewels often seen as earspools or other bodily adornments.<sup>7</sup> Serpents or centipedes usually emerge from the inner cavity of these end flares, with deities or ancestors emerging from their gaping maws. Often we see *k'awiil* heads, the so-called Paddler Gods, or other specific named gods or ancestors of local importance. In general, the display of emerging deities in this particular iconographic setting seems to correspond thematically to the idea conveyed by the important glyphic expressions tzak k'uh and tzak k'awiil, "conjuring gods" and "conjuring spirits." The text of Altar 5 does not make use of these ritual terms, but it would seem that a similar activity is conveyed by Chak Tok Ich'aak's portrait.

The two heads that emerge from the two-headed snake (Figure 14a–b) are each identified by hieroglyphic labels identifying them as *Yaxal Ajaw* (YAX-AJAW) at left, and *Chak Wayaab Chahk* (CHAK-WAY-bi-CHAHK) at right. The deity heads are portraits. Yaxal Ajaw's visage is somewhat damaged, but generally resembles the profile of the solar god K'inich Ajaw. The head of Chak Wayaab Chahk presents a beautiful example of Chahk, the deity of storms and rain.<sup>8</sup> Yaxal Ajaw and Chak Wayaab Chahk (possibly Chak Wayib Chahk) are familiar at La Corona as the names of the first and third

<sup>&</sup>lt;sup>7</sup> The famous large jade flare from Pomona, Belize (Justeson et al. 1992) is perhaps a rare example of a preserved end of a ceremonial bar

<sup>&</sup>lt;sup>8</sup> The image of Chak Wayaab Chahk integrates image and text in an interesting way. Above the portrait head of Chahk are the signs CHAK and WAY-bi. The large head therefore has two somewhat redundant functions, as a glyphic cue for CHAHK and as a portrait of the deity.





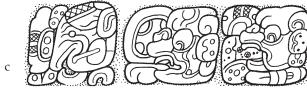


Figure 14. Yaxal Ajaw and Chak Wayaab Chahk: (a–b) the deity heads that emerge from the serpent bar, corresponding to (c) the first and third names of the "La Corona Triad" as named on Panel 1 (photos and drawing: David Stuart).

deities of what might be called the "La Corona Triad," a set of patron gods mentioned on Panel 1 (Figure 14c). Their presence on Altar 5 provides important evidence that these characters (at least two of the three) had a long-term presence as patron deities of the local court. Chak Tok Ich'aak's conjuring or manifesting of these gods offers strong support of the idea that he was a local La Corona ruler, not a visitor from a foreign center.

#### Historical Context and Implications of Altar 5

The historical message of Altar 5 is unusual in that it commemorates a Period Ending event involving a local La Corona ruler at another locale (Baaktuunil). No more context is provided in the inscription and iconography of the altar; the monument's intended audience would clearly have understood the event's larger political and ritual significance. But there are a few connections to be made with inscriptions both at La Corona and at other sites that can help us to flesh out the history of this time and the possible historical context for the altar's dedication.

As it happens, we do find the very same 9.5.10.0.0 Period Ending in another inscription from La Corona:

that on Stela 1, a key Late Classic inscription dating to the late seventh century ce. Its prominence in that long text is indeed a testament to the date's historical importance in local history. A long distance number counts from 9.5.10.0.0, a deep historical "baseline," to an unclear later date where we encounter the record of a ceremony called *mak-way*, "hole?-closing" (Figure 15). This rite is also mentioned with some frequency in the inscriptions of Machaquila and in the painted capstones of Ek Balam. It may be in reference to the closing or "capping" of architectural spaces or ritual deposits. In any event, the local La Corona ruler who oversees the ceremony is named with a vulture-like head with a WINIK sign in its mouth, perhaps a re-use of a name element we know from an earlier figure in La Corona's history.

All of this is a side issue to our present discussion of the 9.5.10.0.0 date itself, which is described only with the verbal phrase **PAT-ji-ya**, followed by a skull-like head above **TUUN-ni** or **TUUN-li**. We interpret the latter elements as probably another example of the place name on Altar 5, Baaktuunil. The verb before it, pat-j-iiy or pat-l-aj-iiy means "it was fashioned" or "it was made," and is typically found in connection with the making of ritual objects or altars. Much of Stela

1's text is too damaged to fill in the details needed to understand the whole picture; suffice it to say that the 9.5.10.0.0 Period Ending was a key historical and ritual event in La Corona's history, enough so to be recalled nearly a century and a half later in Stela 1's long record of ceremonies and dynastic interactions. The identification of the place named Baaktuunil, mentioned there again as a key place in the narrative, remains unknown.

The name Chak Tok Ich'aak should be familiar to students of Classic Maya history as a recurring royal name in the early historical records of Tikal. There at least two Early Classic rulers bore this name, the most famous being the fourteenth member of the dynasty who ruled from about 360 CE and was defeated and apparently killed at the "entrada" of Siyaj K'ahk' in 378. Chak Tok Ich'aak II was the eighteenth ruler, and reigned from 488 or earlier to his death in 508 (Figure 16). The extended name we find on Altar 5 corresponds word-for-word to the name used by these Tikal kings, and its re-use a short time later by a La Corona ruler must have evoked a strong connection to that dynasty. Patterns in the recycling and recurrence of royal names have not been closely studied, but it may well raise the possibility that there was a family connection between Tikal and ruling families at La Corona and/or El Peru.

The presence of the name Chak Tok Ich'aak at La Corona immediately leads us to consider the early historical records of El Peru, located approximately 30 kilometers to the south. There a ruler also named Chak Tok Ich'aak appears in the inscription on the recently discovered Stela 44 (Pérez Robles et al. 2014) (Figure 17). This important monument was dedicated in 564, on the

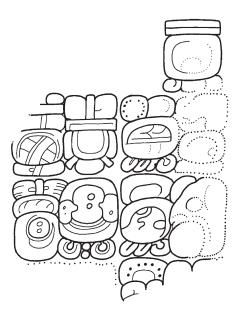


Figure 15. Passage from La Corona Stela 1, recounting 9.5.10.0.0 Period Ending (drawing: David Stuart).

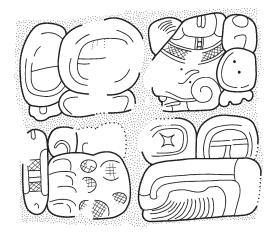


**Figure 16.** Chak Tok Ich'aak of Tikal: (a) portrait on an unprovenanced cache vessel (drawing: Simon Martin); (b) name glyphs from Stela 31 (drawing: David Stuart).

Period Ending 9.6.10.0.0 (exactly one k'atun after Altar 5), overseen by a local ruler named Wa'oom Uch'ahb Ahk. The inscription states that the stela was erected to commemorate Wa'oom's deceased father, named as Chak Tok Ich'aak. He had presumably died shortly before his son's enthronement in the year 556, an event that is also featured on Stela 44.

With the close twelve-year span of the dates on the two monuments (544 on Altar 5 and 556 on Stela 44) there is good reason to think that these mentions of Chak Tok Ich'aak refer to the same historical individual. All the hieroglyphic elements of the extended name are present in both examples, replicating the form also found at Tikal. Only the titles differ: on Altar 5 Chak Tok Ich'aak bears the title Sakwayis, and on Stela 44 he is Waka' Ajaw, "Lord of Waka'" (wa-ka-AJAW).

There are different ways of interpreting this vague evidence, assuming this is the same person. In one scenario Chak Tok Ich'aak is a local La Corona lord, a Sakwayis, who at some point in the span of twelve years came to be "promoted" to be ruler of the larger center El Peru. Alternatively, it is possible that Chak Tok Ich'aak served in these two roles concurrently, as ruler of both centers but holding different titles of his status. Such a scenario may help us to understand why Chak Tok Ich'aak was traveling away from La Corona to commemorate the 9.5.10.0.0 Period Ending.



**Figure 17.** The name of Chak Tok Ich'aak on Stela 44 of El Peru (drawing: Mary Kate Kelly).

Stela 44 from El Peru also provides important context for discerning the wider geopolitical relationships during this murky time in Maya history, going well beyond La Corona and El Peru. The local El Peru ruler who dedicated this monument was Chak Tok Ich'aak's son, Wa'oom Uch'ab Ahk, who assumed the throne of El Peru in 556.9 The 20-year span between the La Corona altar and Stela 44 perfectly agrees with this scenario. The record of Wa'oom Uch'ab Ahk's accession includes a key statement that he is the *y-ajaw*, "the lord of" another individual named K'ahk' Uti' Ch'ich', recently identified as a ruler of the Kaanul court (Martin and Beliaev 2017). As Martin and Beliaev note, the accession of K'ahk' Uti' Ch'ich' most likely came in the year 550, the date of which is implied on Dzibanche Lintel 3 (9.5.16.0.8 7 Lamat 6 Uo). He would not yet have been the Kaanul ruler at the time of the Period Ending commemorated on La Corona's altar, which fell six years earlier. The Kaanul ruler who was on the throne before 550 was instead Tuun K'ab Hix, whose name appears in a number of centers, including on La Corona Panel 6 (the Dallas Altar), where we read that his daughter married the ruler of La Corona we know simply as "Vulture" (his name remains undeciphered) in the year 520 (see Freidel and Guenter 2003; Martin 2008; Stuart et al. 2014). This

obscure La Corona king was probably the immediate predecessor of Chak Tok Ich'aak and possibly his father. While there is no mention of Tuun K'ab Hix on Altar 5, it is probable that he was Chak Took Ich'aak's "overseer" as well, just as K'ahk' Uti' Chich' was the politically dominant Kaanul ruler over Chak Tok Ich'aak's son, Wa'oom Uch'ahb Ahk of El Peru, in 556.

In summary, it seems clear that Chak Tok Ich'aak was a major political actor in the region during the mid-sixth century CE. It would seem that he (1) conjured patron gods and visited places that would remain relevant at La Corona for centuries after he died, (2) ruled at both La Corona and El Peru, and (3) presided over the period during which Kaanul secured its control over the western Peten. Without a doubt, Chak Tok Ich'aak remains a pivotal figure in both La Corona's and El Peru's political history.

One still unresolved question hinges on the Period Ending event commemorated on Altar 5: k'otoy, "he arrived there." As a description of a Period Ending celebration it is unique in Maya inscriptions, and seems difficult to reconcile with what we know of Maya ceremonial practices, the vast majority of which are clearly couched as local happenings. We suspect that the mobility indicated in Altar 5's event has something to do with La Corona's unusual role in Maya politics throughout most of its history, as a small vassal of a far larger center. In the sixth century La Corona (Saknikte') was already part of a far-flung political and family network reaching across large distances of the Maya lowlands. Records from the seventh and eighth century tell us that La Corona's later rulers journeyed far afield to the Kaanul court when it was based at Calakmul, after its seat had been moved from Dzibanche. Altar 5 may therefore provide some evidence that La Corona's ruler was summoned to a foreign ally (Baaktuunil) to participate in a major calendar rite. The location of Baaktuunil remains elusive to us, but it seems likely that it too was closely connected in some way to the geopolitical network of the Kaanul dynasty. Was it near El Peru or even Dzibanche?

We close with one final point regarding this altar and its architectural context. Archaeological investigations in the Coronitas complex are ongoing, and it remains possible that other monuments from this early era in La Corona's history will be found. In fact, the form of Altar 5 might suggest that it was originally part of a larger sculptural program, perhaps conceived and dedicated with a "mirror image" monument bearing the portrait of another royal personage (as would be common at La Corona in subsequent centuries). In its original context, the left-facing portrait of Chak Tok Ich'aak may have been set in direct relation with another monument of similar design, with a seated figure facing to the right. We offer this as no more than speculation and hope to investigate this possibility in future excavations in the Coronitas complex.

<sup>&</sup>lt;sup>9</sup> Wa'oom Uch'ahb Ahk seems a more plausible analysis of the glyphic name than that given by Pérez et al. (2014), who read it as Wa'oom Uch'ahb Tz'ikin. The final sign is clearly an Early Classic logogram for **AHK**, "turtle." Martin and Baliaev (2017) also suggest **AHK** as its proper reading.

<sup>&</sup>lt;sup>10</sup> The hierarchical nature of the *y-ajaw* statements was first brought to light by Houston and Mathews (1985:18-19) and later discussed by Houston (1993) and Martin (2005). Its appearance on a Tepeu I bowl connecting a possible Tikal ruler with a Kaanul king raises particularly interesting issues about the nature of political hierarchies in the sixth century (see Martin and Beliaev 2017).

#### References

Baron, Joanne P.

2012 Operaciones CR14, CR15 y CR17: Excavaciones en el Grupo Coronitas, Estructuras 13R-2, 13R-3, 13R-4 y 13R-5. In Proyecto Regional Arqueológico La Corona No. 4, Temporada 2011, edited by Tomás Barrientos Q., Marcello A. Canuto, and Jocelyne Ponce, pp. 231–264. Report submitted to the Dirección General del Patrimonio Cultural y Natural de Guatemala.

Freidel, David A., and Stanley Paul Guenter

2003 Bearers of War and Creation. *Archaeology (Online Features)*: archive.archaeology.org/online/features/siteq2

González Córdova, Jesús Alejandro, and María Antonieta Cajas 2018 Operaciones CR112 y CR117: Excavaciones en las Estructuras 13R-45 y 13R-7 del Grupo Coronitas. In Informe Final Temporada 2017, Proyecto Regional Arqueológico La Corona, edited by Tomás Barrientos Q., Marcello A. Canuto, and Eduardo Bustamante, pp. 209-240. Report submitted to the Dirección General del Patrimonio Cultural y Natural de Guatemala.

Grube, Nikolai

2005 Toponyms, Emblem Glyphs and the Political Geography of Southern Campeche. Anthropological Notebooks 11(1):87-100.

Grube, Nikolai, and Werner Nahm

1990 A Sign for the Syllable mi. Research Reports on Ancient Maya Writing 33. Center for Maya Research, Washington, D.C.

Houston, Stephen D.

1993 Hieroglyphs and History at Dos Pilas: Dynastic Politics of the Classic Maya. University of Texas Press, Austin.

Houston, Stephen D., and Peter Mathews

1985 *Dynastic Sequence of Dos Pilas, Guatemala*. Monograph 1. Pre-Columbian Art Research Institute, San Francisco.

Justeson, John S., William Norman, and Norman Hammond
 1988 The Pomona Flare: A Preclassic Maya Hieroglyphic Text. In
 Maya Iconography, edited by Elizabeth P. Benson and Gillett
 G. Griffin, pp. 94-151. Princeton University Press, Princeton.

Kaufman, Terrance

2003 A Preliminary Mayan Etymological Dictionary. *FAMSI*: www.famsi.org/reports/01051/index.html

Martin, Simon

2005 Caracol Altar 21 Revisited. The PARI Journal 6(1):1–9.

2008 Wives and Daughters on the Dallas Altar. *Mesoweb:* www. mesoweb.com/articles/martin/Wives&Daughters.pdf

Martin, Simon, and Dmitri Beliaev

2017 K'ahk' Ti' Ch'ich': A New Snake King from the Early Classic Period. *The PARI Journal* 17(3):1–7.

Martin, Simon, and Nikolai Grube

2000 Chronicle of Maya Kings and Queens: Deciphering the Dynasties of the Ancient Maya. Thames and Hudson, London.

Martin, Simon, Alexandre Tokovinine, Elodie Treffel, and Vilma Fialko

2017 La Estela 46 de Naranjo Sa'al, Peten, Guatemala: hallazgo y texto jeroglífico. In XXX Simposio de Investigaciones Arqueológicas en Guatemala, 2016, edited by Bárbara Arroyo, Luis Méndez Salinas, and Gloria Ajú Álvarez, v. 2, pp. 669-684. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.

Pérez, Griselda, Stanly Guenter, David Freidel, F. Castañeda, and Olivia Navarro

2014 El descubrimiento de la Estela 44 de El Perú-Waka': un nuevo capítulo en la historia de los mayas antiguos del noroeste de Petén, Guatemala. In XXVII Simposio de Investigaciones Arqueológicas en Guatemala, 2013, edited by Bárbara Arroyo, Luis Méndez Salinas, and Andrea Rojas, v. 1, pp. 117-124. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.

Ponce, Jocelyn

2017 Operaciones CR112 y CR115: Excavaciones en las Estructuras 13R-1 y 13R-45 del Grupo Coronitas. In Informe Final Temporada 2016, Proyecto Regional Arqueológico La Corona, edited by Tomás Barrientos Q., Marcello A. Canuto, and Eduardo Bustamante, pp. 137-146. Report submitted to the Dirección General del Patrimonio Cultural y Natural de Guatemala.

Schele, Linda

1987 The Figures on the Central Marker of Ballcourt AIIb at Copan. *Copan Note* 13. Copan Mosaics Project, Copan, Honduras.

Schele, Linda, and Mary Ellen Miller

1986 *The Blood of Kings: Dynasty and Ritual in Maya Art.* Braziller; Kimbell Art Museum, Fort Worth.

Stuart, David

2012 The Calligraphic Zero. *Maya Decipherment*: decipherment. wordpress.com/2012/06/15/the-calligraphic-zero/

2015 Earth Caves and Sky Caves: Intersections of Landscape, Territory and Cosmology among the Ancient Maya. Lecture presented as part of the Mesoamerica Center Colloquium Series, The University of Texas at Austin, December 2015. Available: www.academia.edu/35070038/Earth-caves\_and\_Sky-caves\_Intersections\_of\_Landscape\_Territory\_and\_Cosmology\_among\_the\_Ancient\_Maya

2017 A Possible New k'o Sign. Manuscript.

Stuart, David, Marcello A. Canuto, and Tomás Barrientos Q.

2015 The Nomenclature of La Corona Sculpture. *La Corona Notes* 1(2). Mesoweb: www.mesoweb.com/LaCorona/LaCoronaNotes02.pdf

Stuart, David, Peter Mathews, Marcello Canuto, Tomás Barrientos Q., Stanley Guenter, and Joanne Baron

2014 Un esquema de la historia y epigrafía de La Corona. In XXVII Simposio de Investigaciones Arqueológicas en Guatemala, 2013, edited by Bárbara Arroyo, Luis Méndez Salinas, and Andrea Rojas, v. 1, pp. 435–448. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.

Stuart, David, and Stephen D. Houston

1994 Classic Maya Place Names. Studies in Pre-Columbian Art and Archaeology 33. Dumbarton Oaks, Washington, D.C

Thompson, J. Eric S.

1950 <sup>\*</sup> Maya Hieroglyphic Writing: Introduction. Publication 589. Carnegie Institution of Washington, Washington, D.C.

Tokovinine, Alexandre

2013 Place and Identity in Classic Maya Narratives. Studies in Precolumbian Art and Archaeology 37. Dumbarton Oaks, Washington, D.C.



Figure 1. Alfonso in Spain, Summer 2007 (photograph courtesy of Laura Lacadena).

#### In Memoriam: Alfonso Lacadena García-Gallo<sup>1</sup>

#### **MARC ZENDER**

Tulane University

Mesoamericanists everywhere are saddened by the passing earlier this year of Alfonso Lacadena García-Gallo (Zaragoza, August 21, 1964 – Madrid, February 9, 2018). A treasured friend and a brilliant colleague, Alfonso was taken from all of us much too soon after a year's battle with cancer. He is survived by his parents, his loving wife Laura, and their two sons Alejo and Ignacio.

Alfonso spoke frequently of his early childhood fascination with the indigenous peoples of the New World, and of his longing to see the places where the ancient Precolumbian cities of Tenochtitlan (Mexico City), Itzamkanac (Campeche), and Ichcaantiho (Merida) once stood. To paraphrase the words of Alfonso's favorite American country song, which he loved to sing with colleagues and friends in Mexican and European bars: "life seemed old there, older than the trees." He received a broad education at the Colegio de Nuestra Señora del Recuerdo de Madrid (los jesuitas), but occasionally admitted that he sometimes ignored his assigned work in favor of poring over the histories of the Aztec emperors in Fray Juan de Torquemada's Monarquía indiana and Fray Diego Durán's Historia de las Indias de Nueva España. As a young man, just beginning his formal education in Mesoamerican studies, he reached out to various American, Mexican, and European scholars engaged in the study of Mesoamerican languages and hieroglyphic writing, forging lifelong correspondences and friendships with Victoria R. Bricker, Joaquín Galarza, Stephen

D. Houston, Otto Schumann Gálvez, and many others. In future years, he would always remember the generous responses of these and other senior colleagues, and therefore strove to be equally responsive to junior colleagues throughout his long and distinguished career. I will never forget Alfonso's response to my first email to him, in the mid-1990s. Realizing that we would be in Mérida (Yucatan) at the same time, he invited me to visit him at his apartment near the UADY and "talk glyphs." I ended up staying with him for three days, and we talked about much more than glyphs! His enthusiasm for Mesoamerican studies was contagious, and he was generous with his learning.

Alfonso was a Mesoamericanist in the truest sense of the word, equally at home among the snow-capped mountains of Highland Mexico, the hills and plains of the Yucatan peninsula, and the humid neotropical rainforest of the Peten, Guatamala, as well as in the respective languages, writing systems, and indigenous literatures of these regions. Archaeological, epigraphic,

<sup>&</sup>lt;sup>1</sup> Previous, somewhat abbreviated versions of this memoriam were published on the Facebook pages of the Middle American Research Institute, Tulane University, February 10, 2018 (www. facebook.com/mari.tulane/posts/1676472145747032), in the IMS Explorer 47(3):1-5, March 2018, and in *Arqueología Mexicana* 25(150):8-10, April 2018.

and linguistic fieldwork took him to Río Bec, in Campeche; to Ek Balam and Oxkintok, in Yucatan; to La Blanca, Machaquila, and Naachtun in the Peten; and to Jocotan in Chiquimula. And very few archives, libraries, and museums with Mesoamerican collections escaped his attention.

In some thirty years of work, between 1987 and his most recent publications and academic presentations in 2017, Alfonso's accomplishments and contributions to Mesoamerican studies defy brief summary, ranging over such traditionally separated domains as anthropology, archaeology, epigraphy, grammatology, history, linguistics, and literature, as well as the all-too-often dissociated regions of Central Mexico and the Maya area. Alfonso produced scores of insightful articles on decipherment, orthography, and morphology throughout his distinguished career, including the decipherment of several previously-unreadable logographs (e.g., T158/1G4 WI', T164/XE2 HA'AL, T275/ZUJ YAX/yi, T327/AC3 LOK', etc.), the initial recognition of several important grammatical morphemes and constructions in Classic Maya glyphic texts (e.g., passive and antipassive constructions, verbalized nouns, the adverbial use of adjectives, etc.), and perceptive analyses of the types of consonants that were often omitted in Maya writing.

Alfonso pioneered the study of Maya paleography with his 1995 dissertation, which was awarded the Premio Extraordinario de Doctorado of the Universidad Complutense, Madrid, and was professionally

published in 2002. In this study, and in several followup articles, Alfonso clearly indicated the importance of paleographic methodology not only in Preclassic, Classic, and Postclassic Maya contexts (particularly in the Codex Madrid), but also for the study of other Mesoamerican writing systems, such as the "Olmec," Isthmian, and Nahuatl systems. These influential publications have since inspired several ongoing studies into the origins and development of Mesoamerican writing.

With his longtime collaborator and close friend, Søren Wichmann, Alfonso also contributed several remarkable studies charting the pronounced linguistic variation present in Classic Maya texts, including the recognition of a distinctive Eastern Yukatekan "school" of hieroglyphic writing at Chichen Itza and Ek Balam, as well as in the much later Madrid and Dresden codices, prefiguring much recent interest in the historical sociolinguistics of Maya writing.

But it was undoubtedly in the domain of Aztec hieroglyphic writing where Alfonso's contributions have had the most dramatic and lasting impact. In several studies published in 2008, Alfonso revealed the fruits of more than two decades of investigation into the systematics of this script, revealing that—although long seen as a pictorial "proto-writing" that had only become partially phonetic under Spanish influence—Aztec writing was in fact a logosyllabic writing system strikingly similar in structure to Anatolian hieroglyphs and (closer to home) Maya writing, that it already had this



Figure 2. Alfonso in the field, sketching Río Bec Stela 5, 2005 (photograph courtesy of Laura Lacadena).

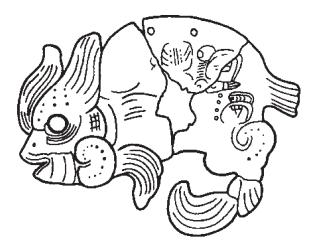


Figure 3. yu-sa-... u-ki-ti 4-le-ku, yu's(kay) ukit kan lehk (took'), "This is the trout of Ukit Kan Lehk Took', king of Ek Balam." Alfonso Lacadena's drawing and epigraphic analysis of Ek Balam Miscellaneous Text 5, Tomb 1, Room 49, Structure 1, Acropolis (after Lacadena 2003a).

structure long before the sixteenth century, and that it had not changed radically during the Colonial period, remaining logosyllabic even in its final known examples from the eighteenth century.

Alfonso's nuanced grammatological perspectives on Mesoamerican writing systems in general, and on Nahuatl hieroglyphs in particular, were immediately recognized as breakthroughs, and his cautious step-by-step methodology is now taught in several universities worldwide, where specialist studies building on the perspectives he pioneered continue to appear.

Alfonso was internationally recognized for his contributions to Mesoamerican studies on October 13, 2011, when he was awarded the prestigious Tatiana Proskouriakoff award of the Peabody Museum of Archaeology and Ethnology at Harvard University. A little more than a year ago, on October 9-13, 2017, the Tercer Encuentro Internacional de Gramatología was held in Alfonso's honor at the Universidad Nacional Autónoma de México. Specialists in the study of writing systems from around the world—including egyptologists, cuneiformists, Linear B specialists, and mesoamericanists—gathered to hear Alfonso's keynote presentation "La escritura jeroglífica náhuatl y el universo colonial español en los siglos XVI-XVII," and to spend a week in amiable and animated conversation about the new perspectives in comparative writing which Alfonso's work has brought to our respective fields. Most recently, a touching homenaje was organized for Alfonso on Friday, November 9th, during which the entire community of European Mayanists gathered during the penultimate evening of the 23rd European Maya Conference in Valencia, Spain, to celebrate Alfonso's exceptional life and extraordinary achievements alongside

his parents, his wife, and his children.

his home university—the Universidad Complutense in Madrid, where he was a professor in the Departamento de Historia de América II (Antropología de América)—he leaves behind several devoted students who will miss his guidance, even as they continue to travel on the roads of investigation he first cleared. Internationally—at the Instituto de Filología del Consejo Superior de Investigaciones Científicas (Madrid), at the Instituto de Investigaciones Filológicas de la Universidad Nacional Autónoma de México (Mexico City), at the Universidad Autónoma de Yucatán (Merida), at Tulane University (New Orleans), and among the European Association of Mayanists, of which he was a founding member—he leaves behind close colleagues and former students committed to the continued application of his perspectives to Mesoamerican writing systems, but who will sorely miss his many insights, his unfailingly generous nature, and his never-ending optimism about the future of Mesoamerican studies.

#### Alfonso Lacadena: A Bibliography

(Note that many of Alfonso's published papers are available online at shsja.academia.edu/AlfonsoLacadena)

#### Sole-authored works

1992 El anillo jeroglífico del Juego de Pelota de Oxkintok. In *Oxkintok 4*, edited by Miguel Rivera Dorado, pp. 177-184. Ministerio de Cultura, Dirección General de Bellas Artes y Archivos, Madrid.

1994 Propuesta para la lectura del signo T158. *Mayab* 9:62-65. Madrid.

1995a El funcionamiento de las escrituras. In *Escritura Indigena en México*, pp. 7-21. Cuadernos del Instituto de Mexico en España, Madrid.

1995bEl funcionamiento de la escritura maya. In *Escritura Indigena en México*, pp. 23-45. Cuadernos del Instituto de Mexico en España, Madrid.

1995c Evolución formal de las grafías escriturarias mayas: implicaciones históricas y culturales. Ph.D. dissertation, Universidad Complutense, Madrid.

1995dRevitalización de grafías escriturarias arcaicas en el Clásico Tardío maya. In *Religión y sociedad en el área maya*, edited by Carmen Varela Torrecilla, Juan Luis Bonor Villarejo, and Yolanda Fernández Marquínez, pp. 29-41. Publicaciones de la Sociedad Española de Estudios Mayas, No. 3. Sociedad Española de Estudios Mayas; Instituto de Cooperación Iberoamericana; Caja de Madrid, Madrid.

1995e Las escrituras logosilábicas: el caso maya. *Estudios de Historia Social y Económica de América* 12:601-607.

1996 A new proposal for the transcription of the *a-k'u-na/a-k'u-HUN-na* title. *Mayab* 10:46-49. Madrid.

1997a On Classic -w Suffix Morphology. Yumtzilob 9(1):45-51. Leiden.

1997b Bilingüismo en el *códice de Madrid*. In *Los Investigadores de la Cultura Maya 5*, pp. 184-204. Universidad Autónoma de Campeche; Secretaría de Educación Pública, Campeche.

- 1997c Cha'/Ka', Yax and Wi'il: Three Examples of Adverbial Use [of] Adjectives in Classic Maya Inscriptions. Texas Notes on Precolumbian Art, Writing, and Culture 78. Center of the History and Art of Ancient American Culture, Art Department, University of Texas, Austin.
- 1997dCodices und ihre Funktion für die Religion in der Mayagesellschaft. In *Die Bücher der Maya, Mixteken und Azteken: die Schrift und ihre Funktion in vorspanischen und kolonialen Codices,* edited by Carmen Arellano Hoffmann and Peter Schmidt, pp. 223-243. Verlag Vervuert, Frankfurt.
- 1997e Afrontar la escasez: el estudio de la América prehispánica. *Anales del Museo de América* 5(1997):7-16.
- 1998 Glifos mayas: procedimientos de composición (I). *Misterios de la Arqueología y del Pasado* 2(18):42-43.
- 2000a Antipassive Constructions in the Maya Glyphic Texts. *Written Language and Literacy* 3(1):155-180.
- 2000b Nominal Syntax and the Linguistic Affiliation of Classic Maya Texts. In *The Sacred and the Profane:* Architecture and Identity in the Maya Lowlands, edited by Pierre R. Colas, Kai Delvendahl, Marcus Kuhnert, and Annette Schubart, pp. 111-128. Acta Mesoamericana 10. Verlag Anton Saurwein, Bonn.
- 2000c Los escribas del Códice de Madrid: metodología paleográfica. *Revista Española de Antropología Americana* 30:27-85.
- 2001 Vocabulario maya jeroglífico. In *Reference Book for the* 6th Maya Hieroglyphic Workshop, compiled by Christian Prager, pp. 222-237. Wayeb; Universität Hamburg, Hamburg.
- 2002a Evolución formal de las grafías escriturarias mayas: implicaciones históricas y culturales. Universidad Complutense, Madrid.
- 2002b Nuevas evidencias para la lectura de T158. *Mayab* 15:41-47.
- 2002c Religion y escritura. In *Religion maya*, edited by Mercedes de la Garza Camino and Martha Ilia Najera Coronado, pp. 171-194. Editorial Trotta, Madrid.
- 2002dLa escritura en Guatemala: jeroglíficos y alfabeto como vehículos de una tradición cultural. In *El país del quetzal*. *Guatemala maya e hispana*, pp. 77-87. Sociedad Estatal para la Acción Exterior, Guatemala.
- 2003a El corpus glífico de Ek' Balam, Yucatán, México / The Glyphic Corpus of Ek' Balam, Yucatán, Mexico. Report submitted to the Foundation for the Advancement of Mesoamerican Studies. Available: www.famsi.org/reports/01057es/index.html
- 2003b El sufijo verbalizador -Vj (-aj ~ -iij) en la escritura jeroglífica maya. In De la tablilla a la inteligencia artificial. Homenaje al Prof. Dr. Cunchillos en su 65 aniversario, edited by Antonino González Blanco, Juan Pablo Vita Barra, and José Ángel Zamora López, pp. 913-931. Instituto de Estudios Islámicos y del Oriente Próximo, Zaragoza.
- 2004a Passive Voice in Classic Mayan Texts: CV-h-C-aj and -n-aj Constructions. In *The Linguistics of Maya Writing*, edited by Søren Wichmann, pp. 165-194. University of Utah Press, Salt Lake City.

- 2004bOn the Reading of Two Glyphic Appellatives of the Rain God. In *Continuity and Change: Maya Religious Practices in Temporal Perspective*, edited by Daniel Graña Behrens, Nikolai Grube, Christian M. Prager, Frauke Sachse, Stefanie Teufel, and Elisabeth Wagner, pp. 87-98. Acta Mesoamericana 14. Verlag Anton Saurwein, Markt Schwaben, Germany.
- 2004c Tiempo histórico y tiempo mítico entre los mayas del Periodo Clásico (ss. II-X d.C.). Revista de Dialectología y Tradiciones Populares 59(1):83-106.
- Tradiciones Populares 59(1):83-106.
  2005a Los jeroglíficos de Ek' Balam. Arqueología Mexicana 13(76):64-69. Available: arqueologiamexicana.mx/mexico-antiguo/los-jeroglíficos-de-ek-balam
- 2005b Excavaciones en Machaquilá, Poptun: Estudio epigráfico realizado durante la temporada 2004. In *Atlas Arqueológico de Guatemala, Reporte 19*, edited by Juan Pedro Laporte, pp. 235-247. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia, Guatemala.
- 2006a Excavaciones en Machaquilá, Temporada 2005: El recinto cuadrilobulado de la Plaza A. In *Atlas Arqueológico de Guatemala, Reporte 20. Exploraciones arqueológicas en el sureste y centro-oeste de Petén,* edited by Juan Pedro Laporte and Héctor E. Mejía, pp. 74-123. Área de Arqueología de la Universidad de San Carlos, Guatemala.
- 2006b El origen prehispánico de las profecías katúnicas mayas coloniales: antecedentes clásicos de las profecías de 12 ajaw y 10 ajaw. In Sacred Books, Sacred Languages: Two Thousand Years of Ritual and Religious Maya Literature, Proceedings of the 8th European Maya Conference, Madrid, November 25-30, 2003, edited by Rogelio Valencia Rivera and Geneviève Le Fort, pp. 201-225. Acta Mesoamericana 18. Verlag Anton Saurwein, Markt Schwaben.
- 2007 Stimmen aus Stein, Stimmen aus Papier: Die Hieroglyphenschrift der Maya. In *Maya: Könige aus* dem Regenwald, edited by Ines de Castro, pp. 78-91. Verlag Gebrüder Gerstenberg, Hildesheim.
- 2008a Regional Scribal Traditions: Methodological Implications for the Decipherment of Nahuatl Writing. *The PARI Journal* 8(4):1-22. San Francisco. Available: www.precolumbia.org/pari/publications/journal/804/index.html
- 2008bA Nahuatl Syllabary. *The PARI Journal* 8(4):23. San Francisco. Available: www.precolumbia.org/pari/publications/journal/804/index.html
- 2008c The *wa*<sup>1</sup> and *wa*<sup>2</sup> Phonetic Signs and the Logogram for *WA* in Nahuatl Writing. *The PARI Journal* 8(4):38-45. San Francisco. Available: www.precolumbia.org/pari/publications/journal/804/index.html
- 2008dEl título *lakam*: evidencia epigráfica sobre la organización tributaria y militar interna de los reinos mayas del Clásico. *Mayab* 20:23-43. Madrid.
- 2008e La escritura olmeca y la hipótesis del mixe-zoque: implicaciones lingüísticas de un análisis estructural del Monumento 13 de La Venta. In *Olmeca. Balance y perspectivas. Memoria de la Primera Mesa Redonda,* edited by María Teresa Uriarte and Rebecca B. González Lauck, pp. 607-626. Universidad Nacional Autónoma de México; Consejo Nacional para la Cultura y las Artes; Instituto Nacional de Antropología e Historia; New World Archaeological Foundation, Mexico.

- 2009 Apuntes para un estudio sobre literatura maya antigua. In *Text and Context: Yucatec Maya Literature in a Diachronic Perspective*, edited by Antje Gunsenheimer, Tsubasa Okoshi Harada, and John F. Chuchiak, pp. 31-52. Bonner Amerikanistische Studien 47. Shaker Verlag, Aachen.
- 2010a Naturaleza, tipología y usos del paralelismo en la literatura jeroglífica maya. In Figuras mayas de la diversidad, edited by Aurore Monod Becquelin, Alain Breton, and Mario Humberto Ruz, pp. 55-85. Universidad Nacional Autónoma de México, Mérida.
- 2010bEscritura y lengua en Tak'alik Ab'aj: Problemas y propuestas. In XXIII Simposio de Investigaciones Arqueológicas en Guatemala, 2009, edited by Bárbara Arroyo, Adriana Linares Palma, and Lorena Paiz Aragón, v. 2, pp. 1027-1044. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.
- 2010c Highland Mexican and Maya Intellectual Exchange in the Late Postclassic: Some Thoughts on the Origin of Shared Elements and Methods of Interaction. In Astronomers, Scribes, and Priests: Intellectual Interchange between the Northern Maya Lowlands and Highland Mexico in the Late Postclassic Period, edited by Gabrielle Vail and Christine Hernández, pp. 383-406. Dumbarton Oaks Research Library and Collections, Washington, D.C.
- 2010dHistorical Implications of the Presence of non-Mayan Linguistic Features in the Maya Script. In *The Maya and Their Neighbours: Internal and External Contacts Through Time. Proceedings of the 10th European Maya Conference, Leiden, December 2005,* edited by Laura van Broekhoven, Rogelio Valencia Rivera, Benjamin Vis, and Frauke Sachse, pp. 29-39. Verlag Anton Saurwein, Markt Schwaben.
- 2011a Historia y ritual dinásticos en Machaquilá (Petén, Guatemala). Revista Española de Antropología Americana 41(1):205-240.
- 2011b Mayan Hieroglyphic Texts as Linguistic Sources. In *New Perspectives in Mayan Linguistics*, edited by Heriberto Avelino, pp. 343-373. Cambridge Scholars Publishing, Newcastle.
- 2011c New Research on the Aztec Script: A True Writing System. 2011 Tatiana Proskouriakoff Award Lecture, Peabody Museum of Archaeology and Ethnology, Harvard University, October 13th. Available: www. peabody.harvard.edu/node/735
- 2012 Syntactic Inversion (Hyperbaton) as a Literary Device in Maya Hieroglyphic Texts. In Parallel Worlds: Genre, Discourse, and Poetics in Contemporary, Colonial, and Classic Period Maya Literature, edited by Kerry M. Hull and Michael D. Carrasco, pp. 45-71. University Press of Colorado, Boulder.
- 2013 Basic Grammar of Hieroglyphic Maya. In *Grammar* of Hieroglyphic Maya. Workbook for the Advanced Hieroglyphic Workshop, European Maya Meetings, Brussels, Oct. 29-31, 2013, pp. 5-68. Brussels, Belgium.
- n.d. La escritura de tradición náhuatl: comentarios, reflexiones y propuestas. To be published in *Revista Española de Antropología Americana*.

#### Co-authored works

- Adánez Pavón, Jesús, Alfonso Lacadena García-Gallo, Andrés Ciudad Ruiz, and María Josefa Iglesias Ponce de León
- 2011 La identificación de unidades socio-administrativas en las ciudades mayas clásicas: El caso de Tikal al Petén, Guatemala. In *Los investigadores de la Cultura Maya 18, 2009*, vol. 1, pp. 1-20. Universidad Autónoma de Campeche; Secretaría de Educación Pública, Mexico.
- Adánez Pavón, Jesús, Andrés Ciudad Ruiz, María Josefa Iglesias Ponce de León, and Alfonso Lacadena García-Gallo
- 2010 Modelos de organización social y administrativa de las ciudades mayas clásicas: historia crítica de un problema. In XXIII Simposio de Investigaciones Arqueológicas en Guatemala, 2009, edited by Bárbara Arroyo, Adriana Linares Palma, and Lorena Paiz Aragón, v. 1, pp. 239-250. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.
- Arnauld, Marie-Charlotte, and Alfonso Lacadena García-Gallo
- 2004 Asentar su autoridad: banquetas en el Grupo B de Río Bec (Campeche, México). *Journal de la Société des Américanistes* 90(1):203-222. Paris.
- Arnauld, Marie-Charlotte, Dominique Michelet, Chloé Andrieu, Alfonso Lacadena García-Gallo, Éva Lemonnier, Boris Vannière, Philippe Nondédéo, Julie Patrois
- 2014 Río Bec. Des grandes maisons et des récoltes. *Journal de la Société des Américanistes* 100(2):107-144.
- Chocón, Jorge E., María Josefa Iglesias Ponce de León, Alfonso Lacadena García-Gallo, and Jesús Adánez Payón
- 2007 Excavaciones en Machaquilá, Petén: Temporada de Campo 2005. In XX Simposio de Investigaciones Arqueológicas en Guatemala, 2006, edited by Juan Pedro Laporte, Bárbara Arroyo, and Héctor Mejía, pp. 565-581. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.
- Ciudad Ruiz, Andrés, María Josefa Iglesias Ponce de León, Jesús Adánez Pavón, and Alfonso Lacadena García-Gallo
- 2003 Proyecto: La Entidad Política de Machaquila (Guatemala) en el Clásico Tardío y Terminal. Informe de la Temporada 2003. Ministerio de Ciencia y Tecnología, Madrid.
- 2004 Investigaciones arqueológicas en Machaquilá: la morada de #-TI'-CHAHK-ki, príncipe de la tierra. Revista Española de Antropología Americana 34:29-62. Madrid.
- 2011 Excavaciones arqueológicas en Machaquilá, Petén, Guatemala. Revista Española de Antropología Americana 41(1):143-173.

- Ciudad Ruiz, Andrés, María Josefa Iglesias Ponce de León, Jesús Adánez Pavón, Alfonso Lacadena García-Gallo, and Jorge Chocón
- 2003 Proyecto: La entidad política de Machaquila, Petén, en el Clásico Tardío y Terminal, informe de la segunda temporada, 2003. In Atlas Arqueológico de Guatemala, Reporte 17, pp. 236-302. Instituto de Antropología e Historia, Guatemala.
- Ciudad Ruiz, Andrés, and Alfonso Lacadena García-Gallo 1999 El códice Tro-Cortesiano de Madrid en el contexto de la tradición escrita maya. In XII Simposio de Investigaciones Arqueológicas de Guatemala, 1998, edited
  - Investigaciones Arqueológicas de Guatemala, 1998, edited by Juan Pedro Laporte, Héctor L. Escobedo, and A. C. Monsón de Suasnávar, pp. 876-888. Museo Nacional de Arqueología y Etnología, Guatemala.
- 2001 Tamactún-Acalán: interpretación de una hegemonía política maya de los siglos XIV-XVI. *Journal de la Société des Américanistes* 87:9-38. Paris.
- 2006 La fundación de Machaquilá, Petén, en el Clásico Tardío maya. In Nuevas ciudades, nuevas patrias: fundación, refundación y relocalización de las ciudades en Mesoamérica y el Mediterráneo antiguo, edited by María Josefa Iglesias Ponce de León and Rogelio Valencia Rivera, pp. 149-180. Sociedad Española de Estudios Mayas, Madrid.
- 2008 Procesos históricos de reorientación durante el Clásico Terminal en Machaquilá. *Mayab* 20:145-160. Spain.
- Ciudad Ruiz, Andrés, Alfonso Lacadena García-Gallo, and Luis Tomás Sanz Castro
- 1999 Los escribas del "Codex Tro-Cortesianus" del Museo de América de Madrid. *Anales del Museo de América* 7:65-94.
- Ciudad Ruiz, Andrés, Alfonso Lacadena García-Gallo, Jesús Adánez Pavón, and María Josefa Iglesias Ponce de León
- 2010 Espacialidad y ritual en Machaquilá, Petén, Guatemala. In *El ritual en el mundo maya: de lo privado a lo público*, edited by Andrés Ciudad Ruiz, María Josefa Iglesias Ponce de León, and Miguel Sorroche Cuerva, pp. 129-151. Publicaciones de la SEEM, 9. Sociedad Española de Estudios Mayas; Grupo de Investigación Andalucía-América; Centro Peninsular en Humanidades y Ciencias Sociales, Madrid.
- 2013 Crisis y supervivencia en Machaquilá, Petén, Guatemala. In *Millenary Maya Societies: Past Crises and Resilience*, edited by M.-Charlotte Arnauld and Alain Breton, pp. 73-91. Electronic document, published online at Mesoweb: www.mesoweb.com/publications/MMS/6\_Ciudad\_etal.pdf
- García Campillo, José Miguel, María Josefa Iglesias Ponce de León, Alfonso Lacadena García-Gallo, and Luis Tomás Sanz Castro
- 1990 Estudio de fragmentos cerámicos con inscripciones glíficas del clásico temprano de Tikal. *Mayab* 6:38-44. Madrid.

- García Campillo, José Miguel, and Alfonso Lacadena García-Gallo
- 1987 Los jeroglíficos de Oxkintok. In *Oxkintok 1*, pp. 91-107. Ministerio de Cultura, Dirección General de Bellas Artes y Archivos, Madrid.
- 1989 Nuevos textos glíficos de Oxkintok. In *Oxkintok 2*, pp. 127-137. Ministerio de Cultura, Dirección General de Bellas Artes y Archivos, Madrid.
- 1990 Notas sobre cuatro dinteles del siglo V. In *Oxkintok 3*, pp. 159-171. Ministerio de Cultura, Dirección General de Bellas Artes y Archivos, Madrid.
- 1992 Sobre dos textos glíficos del Postclásico de Dzibilchaltún. *Mayab* 8:46-53.
- 1992 Signos con valor fonético *si* en la escritura maya. In *Memorias del primer congreso internacional de mayistas, mesas redondas,* pp. 602-628. Universidad Nacional Autónoma de México, Mexico.
- Grube, Nikolai, Alfonso Lacadena, and Simon Martin
- 2003 Chichen Itza and Ek Balam: Terminal Classic Inscriptions from Yucatan. In *Notebook for the XXVIIth Maya Hieroglyphic Forum at Texas*, pt. 2, pp. 1-84. Maya Workshop Foundation, Austin.
- 2003 Proceeding of the XXVIIth Maya Hieroglyphic Workshop. Transcribed by Phil Wanyerka. Cleveland State University, Cleveland.
- Houston, Stephen D., and Alfonso Lacadena García-Gallo 2004 Maya Epigraphy at the Millennium: Personal Notes. In *Continuities and Changes in Maya Archaeology: Perspectives at the Millennium*, edited by Charles W. Golden and Greg Borgstede, pp. 103-110. Routledge, New York.
- Iglesias, María Josefa Ponce de León and Alfonso Lacadena García-Gallo
- 2003 Nuevos hallazgos glíficos en la Estructura 4 de Machaquilá, Petén, Guatemala. *Mayab* 16:65-71.
- 2005 Excavaciones en Machaquila, Poptun: La Plaza F durante la temporada 2004. In *Atlas Arqueológico de Guatemala*, *Reporte 19*, edited by Juan Pedro Laporte, pp. 149-187. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia, Guatemala.
- Kettunen, Harri, and Alfonso Lacadena
- 2014 Methods in Maya Hieroglyphic Studies. Workbook for the Advanced Workshop on Maya Hieroglyphic Writing, 19th European Maya Conference, November 17-20, Bratislava, Slovakia.
- Lacadena García-Gallo, Alfonso, and Andrés Ciudad Ruiz
- 1998 Reflexiones sobre la estructura política maya clásica. In *Anatomía de una civilización: aproximaciones disciplinares a la cultura maya*, edited by Andrés Ciudad Ruiz, Yolanda Fernández Marquínez, José Miguel García Campillo, María Josefa Ponce de León Iglesias, Alfonso Lacadena García-Gallo, and Luis Tomás Sanz Castro, pp. 31-64. Sociedad Española de Estudios Mayas, Madrid.

- Lacadena García-Gallo, Alfonso, and Andrés Ciudad Ruiz (continued)
- 2000 Más que militares y comerciantes: La continuidad de la escritura jeroglífica maya en los periodos post-clásico y colonial. In XIII Simposio de Investigaciones Arqueológicas en Guatemala, 1999, edited by Juan Pedro Laporte, Héctor L. Escobedo, Ana Claudia de Suasnavar, and Bárbara Arroyo, v. 1, pp. 553-587. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia; Asociación Tikal, Guatemala.
- Lacadena García-Gallo, Alfonso, and Andrés Ciudad Ruiz 2009 Migraciones y llegadas: mito, historia y propaganda en los relatos mayas prehispánicos en las tierras bajas. In *Diásporas, migraciones y exilios en el mundo maya*, edited by Mario Humberto Ruz, Joan García Targa, and Andrés Ciudad Ruiz, pp. 57-78. Sociedad Española de Estudios Mayas; Universidad Nacional Autónoma de México, Mérida.

Lacadena, Alfonso, and Kerry Hull

- 2012 Ancient Maya Poetics. Workbook for the Advanced Workshop, 17th European Maya Conference, Dec. 10-12, Helsinki, Finland.
- Lacadena García-Gallo, Alfonso, and María Josefa Iglesias Ponce de León
- 2003 Nuevos hallazgos glíficos en la Estructura 4 de Machaquila, Petén, Guatemala. *Mayab* 16:65-71.
- 2005 Una relación epigráfica relacionada con la Estructura 4 de Machaquila, Petén. In XVIII Simposio de Investigaciones Arqueológicas en Guatemala, 2004, edited by Juan Pedro Laporte, Bárbara Arroyo, and Héctor E. Mejía, v. 2, pp. 677-690. Ministerio de Cultura y Deportes; Instituto de Antropología e Historia, Asociación Tikal; FAMSI, Guatemala.
- 2006 La recreación del espacio mítico de la Montaña de las Flores en un palacio de Machaquila, Petén. In XIX Simposio de Investigaciones Arqueológicas en Guatemala, 2005, edited be Juan Pedro Laporte, Bárbara Arroyo, and Héctor E. Mejía, v. 2, pp. 589-599. Museo Nacional de Arqueología y Etnología, Guatemala.

Lacadena, Alfonso, and Søren Wichmann

- 2002 The Distribution of Lowland Maya Languages in the Classic Period. In La organización social entre los mayas prehispánicos, coloniales y modernos. Memoria de la Tercera Mesa Redonda de Palenque, edited by Vera Tiesler Blos, Rafael Cobos, and Merle Greene Robertson, v. 2, pp. 276-318. Instituto Nacional de Antropología e Historia; Universidad Autónoma de Yucatán, Mexico.
- 2004 On the Representation of the Glottal Stop in Maya Writing. In *The Linguistics of Maya Writing*, edited by Søren Wichmann, pp. 103-162. University of Utah Press, Salt Lake City.
- 2005 The Dynamics of Language in the Western Lowland Maya Region. In *Art for Archaeology's Sake: Material Culture and Style across the Disciplines. Proceedings of the 33rd Annual Chacmool Conference*, edited by Andrea Waters-Rist, Christine Cluney, Calla McNamee, and Larry Steinbrenner, pp. 32-48. Chacmool Archaeological Association, University of Calgary, Calgary.

- 2008 Longitud vocálica y glotalización en la escritura jeroglífica náhuatl. Revista Española de Antropología Americana 38(2):121-150. Madrid.
- 2011 Introduction to Nahuatl Hieroglyphic Writing. Workbook for the Advanced Workshop of the 16th European Maya Conference, December 5-8, København, Denmark.
- n.d. Harmony Rules and the Suffix Domain: A Study of Maya Scribal Conventions. Available: www.academia. edu/1378231/

Lacadena, Alfonso, and Marc Zender

- 2001 Classic Maya Grammar. Notebook for the Advanced Workshop, 6th European Maya Conference, Dec. 5-9, Universität Hamburg, Germany.
- Michelet, Dominique, Philipe Nondédéo, Grégory Pereira, Julie Patrois, Charlotte Arnauld, and Alfonso Lacadena
- 2010 Rituales en una sociedad «sin» reyes: el caso de Río Bec y del edificio A (5N2) en particular. In El ritual en el mundo maya: de lo privado a lo público, edited by Andrés Ciudad Ruiz, María Josefa Iglesias Ponce de León, and Miguel Sorroche Cuerva, pp. 129-151. Publicaciones de la SEEM, 9. Sociedad Española de Estudios Mayas; Grupo de Investigación Andalucía-América; Centro Peninsular en Humanidades y Ciencias Sociales, Madrid.
- Nondédéo, Philippe, and Alfonso Lacadena García-Gallo 2004 Kajtún: un nuevo sitio maya con monumentos esculpidos en la región Río Bec. *Journal de la Société des Américanistes* 90(1):183–201. Paris.
- Nondédéo, Philippe, Julie Patrois, Alfonso Lacadena García-Gallo, M. Charlotte Arnauld, Eric Taladoire, and Dominique Michelet
- 2010 De la autonomía política y cultural de la provincia de Río Bec. *Estudios de Cultura Maya* 36:37-66.
- Vargas de la Peña, Leticia, Víctor R. Castillo Borges, and Alfonso Lacadena García-Gallo
- 1999 Textos glíficos de Ek' Balam (Yucatán, México): Hallazgos de las temporadas 1996-1998. In *Los Investigadores de la Cultura Maya 7*, vol. 1, pp. 172-187. Universidad Autónoma de Campeche; Secretaría de Educación Pública, Campeche.
- 2001 El mural glífico del cuarto 22 de la acrópolis de Ek' Balam. *Boletín informativo: La pintura mural prehispánica en México* 7(14):47-50. Mexico.
- 2007 El Mural del Cuarto 22 de Ek' Balam, Yucatán, México: ritual y profecía de Año Nuevo en el periodo Clásico maya. *Mayab* 19:107-121.
- Vargas de la Peña, Leticia, Víctor R. Castillo Borges, Teresa Ceballos Gallareta, and Alfonso Lacadena García-Gallo
- 2007 El Cuarto 44 de la Acrópolis de Ek' Balam. In *Los Investigadores de la Cultura Maya 15*, vol. 2, pp. 371-383. Universidad Autónoma de Campeche; Secretaría de Educación Pública, Campeche.