Several obvious physical differences separate the Maya sites of Palenque and Tulum, the most extreme being their opposite locations on the margins of the Maya world. Although both sides possess an unusual architectural form for the Maya area (small temples within temples), the physical appearance of the buildings and the site plans are quite different indeed, partially reflecting the difference between the Late Classic and Late Post-classic Periods. Striking too are the environmental differences of the two sites. The buildings of Palenque are set in the forested hills overlooking the flat lands of the Tabasco plain. Tulum, on the other hand, is conspicuously perched on an elevation above an otherwise flat limestone land formation along the Caribbean sea. The differences of setting are echoed in cosmological functions of the two sites. These differences are so extreme that they can be considered oppositions. In this paper I chart briefly some of these oppositions and I comment on their implications.

Palenque as a Burial Site. Much was said during the December 1973 meetings about Palenque as a burial site. The spectacular tomb of Pacal inside the Temple of the Inscriptions was cited as the most magnificent of many tombs at Palenque. It was suggested that the tombs known from Palenque number in the thousands and that many thousands more probably exist. Very few of the “known” (primarily by looters) burials have been properly excavated or recorded by archaeologists. Nevertheless, the consensus of opinion was that Palenque was a special place for the burial of the dead and that it may in fact have been a Maya necropolis. This was agreed upon notwithstanding the fact that three of Palenque’s temples contain inscriptions which may describe the birth of important Maya deities (Kelley 1965).

How such an urbane, sybaritic architectural style as that of Palenque could have been dedicated to the cult of the dead is not so difficult to understand if we discard for a moment our traditional Western lugubrious feelings towards death and the underworld. We must remember that the contents of Maya tombs we know archaeologically suggest that the Maya associated the passage into the Underworld with a great deal of pomp and ceremony that is hardly ascetic in character. The elaborate “palace” architecture and splendid stucco sculpture of Palenque reflects the prosperity, influence, and power of the Classic Period Palencanos, probably in part a result of Palenque’s prominence as a major Maya necropolis. I ascribe to the general opinion that Palenque was a major Maya burial site.

The consideration of Palenque as a Maya necropolis is strengthened by its extreme western position in the Maya realm, about which there is more to say in the following section. In Maya thought, the West and the South are associated with the Underworld. The legendary land of the dead, Xibalba, was supposed to be located in the South where highlands meet lowlands (Thompson 1970: 300); this was perhaps Chama during Classic times and perhaps Izapa at an earlier period. Palenque is situated in the southwest of the Maya realm where highlands meet lowlands, a good Underworld position and indeed may have been associated with Xibalba. Such directional associations of a site of course implies that the Maya had a geographic sense of the location of...
their centers in relation to one another, an assumption I think valid in view of what we know about Maya preoccupation with directional significance on a cosmological level.

There is another Maya site which is also located in the extreme Western geographical position of the Maya area. This site is indisputably a Maya necropolis. I am referring to the site of Jaina, located on an island off Campeche.

**Palenque’s Position in the Maya Area and Certain Astronomical Phenomena.** Three astronomical bodies which were of great importance to the Maya descend in the western sky. These are the sun, the moon, and the planet Venus. Other important astronomical bodies visible to the ancient Maya also descend in the western sky such as Jupiter. However, the sun, moon, and Venus seem to have been the most important to the Maya as indicated by the codices and our current corpus of Maya inscriptions.

It seems that when an astronomical body disappeared in the western sky it was thought by the Maya to be undergoing passage from one world into another, leaving the world of the living and beginning its journey in the world of the dead.

At this point it might be useful to digress a bit and to review the fact that the Maya thought of their universe as existing on three levels: the upper world inhabited by supernatural creatures we call gods, the lower world inhabited by supernatural creatures we also call gods, and then a natural middle world of actuality inhabited by mortals. This tripartite division of the Maya universe is depicted clearly in the murals of Tulum and Maya codices (see Miller 1972; 1974). For instance, in the painting of the interior of Structure 5 at Tulum, the upper band contains sky signs, the middle band earthly scenes, the lower band Underworld scenes.  

The Maya gods of the Upperworld and the Underworld were capable of shifting from one supernatural state to another, from the Upperworld to the Underworld (see Thompson 1970: 216 for a lucid description of this deity mobility using Itzam Na as an example). The Maya gods were also capable of inhabiting any number of time periods, from the distant primordial past to the infinite future. The middle world, that of natural existence, was thought of as being locked into one position in time and space. Inhabitants of that world of actuality were, by definition, mortal by the very fact that they could not move freely into other states of time and space as could the supernatural beings — the gods. The rigid finiteness of the middle world of actuality is directly depicted in the Tulum mural showing middle register locked into position by the bounding upper and lower registers (Fig. 1).  

The Mayas, being of seemingly endlessly complicated nature, also believed that supernatural creatures of their universe could take the form of astronomical phenomena. Thus the sun was Kin, the moon was Ix Chel, and Venus was Kukulcan. These heavenly bodies and their deity associations cyclically occupied the day sky and the night sky, the supernatural world of the living and the supernatural world of the dead above and below the world of the mundane.

Because Palenque is a westernmost site in the Maya area, it occupies the position nearest that of the descent of the sun, moon, and Venus in the west, nearest to the Underworld. This marginal position of Palenque between the world of the living and the supernatural world of the dead contributes to an understanding of its funerary iconography and inscriptions. On the Temple of the Inscriptions sarcophagus lid, Pacal is shown defied as Kin, the sun, descending into the open jaws of the Underworld. The Temple of the Inscriptions, in which Pacal is buried, is so situated that during the Winter solstice the sun, Kin, can be seen from the Tower to descend in a line directly behind the center of the Temple of the Inscriptions, exactly at the location of Pacal’s sarcophagus.

There are other examples of Palenque iconography depicting the descent of the sun and Venus in the west in the form of Kin and Venus signs associated with bicephalic monsters, particularly in House E. Linda Shede is currently studying this fascinating iconographic complex.

**Tulum and the East Coast of the Yucatan Peninsula as Pilgrimage Areas: Birth and Rebirth.** If Palenque is a Maya necropolis because of its western location within the Maya area, its many elaborate burials, and its funerary iconography and inscriptions, we should find Maya centers with the opposite characteristics in the extreme eastern parts of the geographic region inhabited by the Maya. The Tulum-Tanah area of the east coast of the Yucatan Peninsula facing the eastern sea we now call the Caribbean should be, according to any logical dualistic system, an area representative of birth and rebirth. In fact, this is the case.  

A brief survey of some of the ethnohistoric accounts and iconography regarding birth and rebirth beliefs of the East Coast Maya confirms the astronomical implications associated with this most eastern area of the Maya world. It is known from ethnohistoric accounts that Ix Chel, the goddess of the moon, child birth, procreation, and medicine, was an important deity for the East Coast Maya. All of these associations have something to do with renewal. There was a major shrine to Ix Chel on Cozumel. There were abundant representations of her
found by the Spanish on an island north of Cozumel; so prominent were these female deity representations that the Spanish named the island of the Ix Chel idols "Isla Mujeres." Representations of Ix Chel are found in the murals of Tulum.

Because Ix Chel is also goddess of the moon, it makes sense that this astronomical association of Ix Chel should be most important on the East Coast where the moon rises and appears to be born out of the eastern sea. Pregnant women consulted the famous idol of Ix Chel on Cozumel Island. When a child is born it emerges from an interior world of the mother. Perhaps the association of a child born and the moon seemingly reborn out of the belly of the earth in the eastern sky was a part of the metaphorical Maya belief.

There is increasing evidence that the east coast of the Yucatan Peninsula was a major pilgrimage attraction during the Postclassic Period. The current investigation of the Tancab-Tulum Archaeological Project indicates that during the period after 1450 until the Spanish conquest (the last phase of the Postclassic Period, which we call Phase 3), profitable commercial trade routes with the highlands, probably via the Chontal Maya, combined with a sort of pre-Columbian tourism based on cult centers promising renewal of the religious spirit to render the East Coast a boom area. The area became a kind of Mecca for the Maya and possibly for many people from the rest of Mesoamerica. It seems that for the Maya the incredible green blue color of the sea off the East Coast symbolized rebirth. Pre-Columbian pilgrims came to this area to be renewed, born again. Perhaps the red handprints which are so common on the Postclassic standing architecture of the East Coast are evidence of such pilgrimages.

In previous papers (Miller 1972; 1974) I have stressed the birth iconography of the site of Tulum and associated it with surviving myths of the Maya which describe Tulum and the East Coast as an area of rebirth. Representations of umbilical cords attached to newborn figures are prominent at Tulum in the upper west facade of Temple 16. The cosmic umbilical cord described in the Maya Kusansum myth (Miller 1972; 1974) features conspicuously in the important mural decorating the interior of Temple 5. In addition, the Diving God shown prominently in the inner building of Structure 25 is also shown associated with the cosmic umbilical cord.

There is an architectural expression of rebirth at Tulum. The easternmost structure at Tulum, Structure 45, is a round-based structure. Round structures are associated with Kukulcan. One of Kukulcan's most important manifestations is Venus as Morning Star. According to the widespread pan-Mesoamerican myth, Kukulcan was reborn in the east in the form of Venus as Morning Star after descent and death in the west and a long passage in the Underworld.

East and West: Tulum and Palenque. Emergence from the Underworld to the world of life is a cosmological theme in the iconography of Tulum. This is so principally because of Tulum's geographical position in the Maya area: the extreme East.

The sudden appearance of Venus on the horizon of the eastern sea was an event of extraordinary importance for the ancient Maya. After so long a period out of sight, undergoing passage in the Underworld, the reappearance of Venus must have been somewhat like seeing a corpse walking around. In fact, we know that the first five days of the heliacal rising of Venus was for the Maya and all Mesoamerican peoples fraught with deathly omens. During this unlucky five-day period when Venus first appeared again in the early morning eastern sky, no new projects were begun, voyages embarked upon, or public events planned. It is known that the Aztecs of Mexico had such a fear of these first five days of the heliacal rising of Venus that they closed very tightly all doors and chimney holes in their houses so that the light of Venus as Morning Star would not enter. Perhaps the directional orientation of most of Tulum's buildings facing away from the east and away from the light of Venus upon heliacal rising reflects this belief.

For the Maya, as well as all Mesoamerican peoples, the long passages of Venus in the Underworld rendered that planet extremely dangerous, full of Underworld influences. The Maya called Venus Xux Ek (wasp star) capable of inflicting harm on the living after so long a sojourn with the dead. The wasp was chosen to represent Venus as new morning star because it, like Venus, can inflict pain upon man.

Perhaps the clearest example of the Maya fear of Xux Ek is to be found on pages 46-50 of the Dresden Codex. On these pages, the evil effects of the first five days of Venus as Morning Star (as Xux Ek) are depicted figuratively and glyphically (Thompson 1972: 62-71).

A dramatic representation of Xux Ek is depicted on the sky band of the Tulum Structure 5 interior mural as a stylized top view of a wasp showing the insect's thorax and two wings (Fig. 1). This interior mural featuring Xux Ek is located on the east interior wall of Structure 5, simulating the actual appearance of Xux Ek low on the eastern horizon for 5 unlucky days every 582 days (the Venus cycle).

Directly below the sky band featuring Xux Ek is the principal scene showing two pairs of figures confronting each other, one of each pair an aged seated female holding an elaborate offering, the other of each pair an elaborately dressed standing male gesturing respectfully toward the seated female. Flanking these confronting figures are two representations of fantastic bird-like creatures emerging from the sky band above the feline claws and wearing jade necklaces and wristlets and smoking cigars (are these representations of God L?). A cigar-smoking flanking figure is found at Palenque in the Temple of the Cross, recalling the incident of cigar smoking in the Popul Vuh.

Beneath the horizontal jaguar pelt band upon which the figures of the middle register are positioned is the lowest register. Shown are fish-like, turtle-like, and snake-like creatures. The figure in the center of the lowest register is shown as if floating in water. He is
emerging from a turtle-like creature enframed by the twisted body of a serpent and has feline paws like those of the two flanking cigar-smoking creatures of the middle register. The feet of this lower register creature are also feline. In addition he wears jade necklace and wristlets as do the two end figures of the middle register.

Because floating marine imagery appears in the lower register we can be reasonably certain that an underwater scene is depicted. The shape of the lower register also suggests an underwater scene. The benches to the north and south of the room have constricted the area of paintable space on the east wall of Structure 5. Consequently, the effect is one like the bottom of a river bed, lake, cenote, or sea seen in profile view. I do not think that this visual effect is accidental. Rather, I believe that the effect was contrived to reinforce the image of watery Underworld which the lowest register is meant to represent.

Indeed, the sources of water such as rivers, lakes, cenotes, and the sea suggest the Underworld quite literally by being below the level of the earth and containing an unknown world, usually dark.

If the walls of Structure 5 were laid flat on the ground, the mural on the east wall would assume directional significance. The upper register of the sky band featuring the Xux Ek would be on the extreme east and lowest register of the watery Underground would be on the extreme west. The figures occupying the middle register positioned upon the jaguar pelt would represent the center.

Is it possible that the many streams and springs in the hills behind Palenque were associated in the Maya mind with the Underworld? Is it also possible that the Maya were aware that the water from the western hills of the peninsula eventually finds its way, via underground rivers, to the brilliantly clear blue waters of the Caribbean?

Summary. Palenque and Tulum are located at the extreme western and eastern limits of the Maya area. Both sites seem to have been dedicated, partially at least, to the expression of opposite Maya cosmological associations. This dialectical directional cosmology was intimately tied up with astronomical bodies and the deities which the Maya believed took the form of these astronomical phenomena. Associated with West and descending astronomical bodies the deities such as the sun, moon, and Venus is Palenque, notably replete with elaborate burials, and funerary iconography and inscriptions. Associated with East and ascending astronomical bodies and their deities is Tulum, whose architecture as well as sculptural and mural iconography is dedicated to the concept of rebirth.

For the Maya the cycle of the astronomical bodies such as the sun, moon, and Venus symbolized the supernatural cycle of the gods revolving around the mundane world of actuality, alternately occupying the day sky and night sky — the supernatural world of life and of death.

At this point in our knowledge of the iconography and inscriptions of Palenque and Tulum it is only possible to chart briefly the directional implications of these two sites on the margins of the Maya world. Despite the current limitations of our knowledge, I believe that future research at both Palenque and Tulum will amplify the observations on the cosmological significance of these two important Maya sites.

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