2. Water and Fire: Archaeology in the Capital of the Mexica Empire

Leonardo López Luján

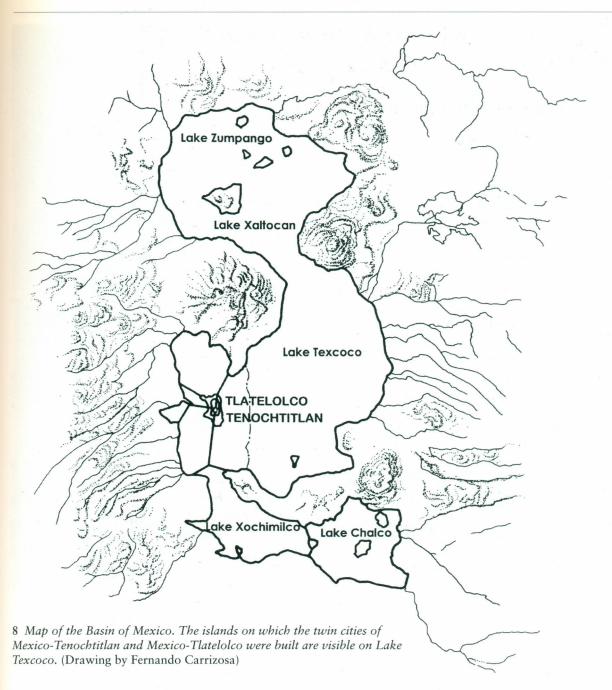
The archaeology of Mexico-Tenochtitlan

As recently as two decades ago, systematized information Mexico-Tenochtitlan, on the metropolis of the most important Mesoamerican state at the time of the Europeans' arrival, was extremely scarce. Unlike other cities such as Tikal, Monte Albán and Teotihuacan, the capital of the Mexica (Aztec) empire was never the site of extensive excavation projects that were to bring its principal remains to light. The explanation for this archaeological ignorance is very simple. In 1521, the island occupied by the twin cities of Mexico-Tenochtitlan and Mexico-Tlatelolco fell into the hands of the Spanish conquerors (fig. 8). After the victory, Hernán Cortés took the historic decision to destroy the metropolis which had been home to between 200,000 and 300,000 inhabitants and covered an area of 13.5 square kilometres (Rojas 1992: 31-5, 57-84). On its ruins was founded Mexico City, the capital of New Spain and, from 1821 onwards, the capital of the Mexican Republic. Obviously, colonial and modern buildings caused problems for archaeologists. In fact, it was only in exceptional circumstances and in relatively limited areas that it had been possible to bring to light small portions of the prehispanic city.

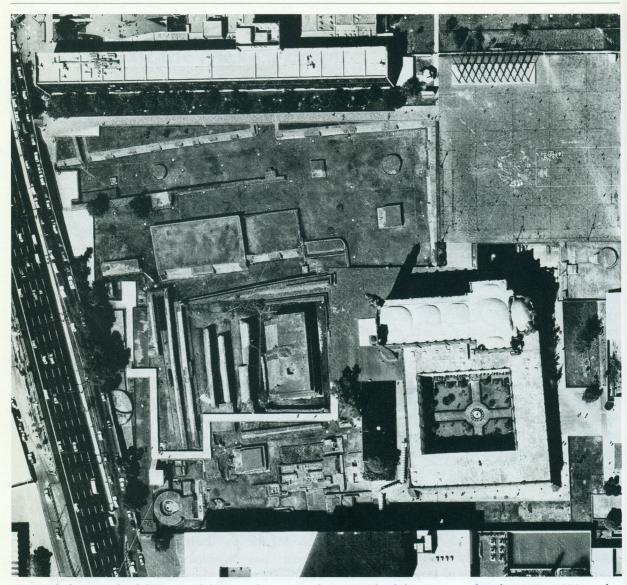
Despite this serious constraint, those researching Mexica society have one clear advantage over colleagues studying the Maya area or sites like Monte Albán and Teotihuacan: numerous documentary sources from the sixteenth century. In some ways, it could be said that the abundance of historical records of life in

Tenochtitlan made up for the lack of archaeological exploration on a large scale. For example, the graphic and written information on the Templo Mayor (Great Temple) of Tenochtitlan was enough to reveal the history of the most important religious building of the empire from its founding, through its multiple extensions and right up to the time when it was completely dismantled. In fact, no other monument in Ancient Mexico so commanded the attention of both natives and outsiders alike or was the subject of such lengthy descriptions as this double temple dedicated to Huitzilopochtli (the God of Sun and War) and Tláloc (the Rain God). All kinds of information relating to the Great Temple can be found in the indigenous pictographic documents and Náhuatl language texts; in the accounts of the European conquerors who saw it functioning and witnessed its destruction: in the narratives of the Spanish friars, which were often based on the native tradition; and even in the fantastical writings, illustrated with extravagant engravings, which circulated in Europe from the sixteenth century (León-Portilla 1987).

Little by little, the information contained in historical sources was augmented by the remains of the Mexica culture accidentally dug up during development work and the construction of buildings. But it was not until the end of the eighteenth century that spectacular finds such as the Stone of the Sun, the sculpture of Coatlicue and the Stone of Tízoc prompted scholars of prehispanic Mexico to compare archaeological data and historical data in a systematic way.



Unfortunately, many of the accidental discoveries made during the nineteenth and twentieth centuries were destroyed or else fell easy prey to pillaging, thus swelling national and foreign collections. Others, fortunately, were recorded *in* *situ* and were rescued by archaeologists during salvage work, thus becoming part of the collections of the Mexico City National Museum of Anthropology (Boone 1987).



9 Aerial photograph of the ruins of the Sacred Precinct of Mexico-Tlatelolco, excavated in the 1940s, 1970s and 1980s. (Photo: courtesy of Aerofotoservicios S.A. de C.V.)

The Templo Mayor project (1978–97)

The first large-scale excavation on the ancient island of Mexico goes back to the 1940s (López Luján 1989). We owe this unique work to Pablo Martínez del Río and Antonieta Espejo, who explored the portico of the Church of Santiago and retrieved the remains of the Templo Mayor of Tlatelolco from the rubble. After twenty years of inactivity, work was continued in the same area. As a result of new fieldwork, a number of religious buildings were exposed, together with thousands of human burials, which also formed part of the Tlatelolco Sacred Precinct (fig. 9).

By contrast, the large-scale exploration in the Sacred Precinct of Tenochtitlan had to wait until February 1978, when the sculpture representing



10 Aerial photograph of the ruins of the Sacred Precinct of Mexico-Tenochtitlan, excavated between 1978 and 1997. (Photo: courtesy of Aerofotoservicios S.A. de C.V.)

Coyolxauhqui, the Moon Goddess, was accidentally discovered. Given the enormous scientific importance of this monolith and the surrounding area, the National Institute of Anthropology and History (Instituto Nacional de Antropología e Historia – INAH) decided to organize a long-term research project entitled 'Proyecto Templo Mayor' (Great Temple Project). So far, five campaigns of fieldwork have been carried out. The first three (1978–82, 1987 and 1989) were coordinated by Eduardo Matos Moctezuma, and the last two (1991–2 and 1994–7) by the author of this paper. During this time we have been able to retrieve a considerable part of one of the most prominent ritual sites of the Mesoamerican world (fig. 10). Among the more significant discoveries are the

ruins of the Templo Mayor of Tenochtitlan and 14 neighbouring buildings, 134 offerings, more than 9,000 artefacts and a considerable collection of sculptures and wall paintings. The area excavated extensively measures 1.3 hectares. Nonetheless, it must be noted that although this area might seem large, it is only equivalent to 0.1 per cent of the total area of the twin cities.

In 1983 the archaeological site was opened to visitors for the first time. That same year, once the first phase of excavation was completed, our project proceeded to the stage of laboratory analysis. As a result of that phase, more than 130 papers have been published by members of the project as well as guest researchers (Gutiérrez Solana 1989). Thanks to the enormous importance of the excavated area, information of the highest quality was made available which has enabled us to verify, complement and even reconsider many suppositions which we formerly held to be true (Matos Moctezuma 1988; Broda, Carrasco and Matos Moctezuma 1987; López Luján 1994). Finally, I would like to mention that in October 1987 what was without doubt one of our main objectives was realized: the opening of the Museum of the Templo Mayor. The premises presently house the project headquarters and eight rooms where archaeological material from the excavations is exhibited.

Recent work on the House of Eagles

The House of Eagles (also known as the Precinct of the Eagle Warriors) is one of the most impressive finds from the first phase of fieldwork. It consists of a large platform with an L-shaped ground plan, whose staircase is decorated with two sculptures in the shape of eagle heads (col. pl. 6). In 1981, after exploring the inside of this building, an older substructure was found which is contemporary with Stage IVb of the Templo Mayor (*c*. AD 1469). It is characterized by the presence of several inner rooms which are in a perfect state of conservation because they were buried ritually and with great care when it was decided that a new extension would be built. We know that in prehispanic times one entered this substructure by two staircases which extended from the square to the wide portico which was supported by a colonnade. To reach the main room one had to pass through a door guarded by two ceramic sculptures which represent full-length individuals dressed in eagle costumes. From the main room, where the altar was situated, the visitor passed into the remaining rooms through a passageway protected by two huge skeletal figures, also made of fired clay. In this way, one arrived at a rectangular patio bordered by two rooms. Each room contained an altar and a pair of ceramic braziers decorated with the face of the Rain God.

Almost all the inside walls of the House of Eagles are decorated with beautiful paintings painted on clay and long polychrome benches. The latter are made up of two panels. The upper panel is a frieze depicting undulating snakes in bas-relief. The lower panel shows processions of armed warriors who merge in a zacatapayolli, a ball of grass to which the Mexicas (Aztecs) would stick the bloodstained agave thorns used during the ritual of self-sacrifice. The rich iconography of the benches tells us that the blood offering was one of the main ceremonies carried out in the building. What is more, the iconography is a magnificent example of the Mexica taste for imitating the artistic styles of more ancient civilizations, such as those of Teotihuacan and Tula, which flourished in the Basin of Mexico several centuries earlier (Fuente 1990; Matos Moctezuma and López Luján 1993). In this instance, we are looking at a 'revival' of the Burnt Palace, one of the many buildings excavated by the Mexicas at the Toltec capital of Tula, which by this time lay in ruins.

Thanks to the collaboration between the INAH, the Autonomous University of Mexico (Universidad Nacional Autónoma de México – UNAM) and the Mesoamerican Archive and Research Project of Princeton University, we have been able to continue our work on this exceptional building. During the last two phases of fieldwork (1991-2 and 1994-7), a small team of archaeologists, biologists, chemists and restorers undertook new studies which aim to shed light on the functions and activities which took place in the House of Eagles. Our first aim was to reconstruct the ritual activities which were carried out in this place on a daily basis. With the help of the team coordinated by Luis A. Barba, we cut out a tiny cylindrical piece from each square meter of the stucco floor, retrieving in this way more than five hundred samples. By means of microchemical analysis of these samples, we found deposits of carbonates, phosphates, fatty acids, albumin (the main protein in blood) and other compounds. Once it was transferred to the computer, this information helped us to deduce that specific activities took place in particular parts of the building: the offering of food to the gods, selfsacrifice and the burning of copal incense (Ortiz et al. 1996).

The next task was to detect and excavate all types of features buried beneath the stucco floors of the House of Eagles. For this purpose we used two magnetometers and a resistivity meter, instruments which helped us to discover magnetic and electric anomalies produced by several of the buried offerings, a drainage system and a smaller, older building. We continued to excavate in those places showing the greatest anomalies. After a year of meticulous work, we were able to record in detail and recover, among other things, eight offerings and a burial, which were found beneath floors, altars and staircases. The burial was that of an adult whose corpse was incinerated and remains crushed and reincinerated. Three ceramic urns were used as containers for the bones and a rich offering consisting of cotton textiles, bloodletting implements for self-sacrifice, copper needles, eagles' claws, feline teeth, obsidian sceptres and ornaments made of gold sheet. Of the three urns, the one that stands out is a Teotihuacan vessel which dates from the Classic period. Without a doubt, this urn was the fruit of excavation carried out by the fifteenth-century Mexicas in the ruins of Teotihuacan, which had long been abandoned by that time.

Because the House of Eagles is presently partially buried beneath Justo Sierra Street, the decision was made to dig two long tunnels beneath the visitors' walkway in the archaeological zone (López Luján 1995). Many months of hard work exposed two new large-proportioned rooms decorated with wall paintings, and over thirty metres of benches with their polychromy almost completely intact. The most amazing find made inside the tunnels dates from September 1994: two huge ceramic sculptures were dug up which flanked a previously undiscovered entrance (López Luján and Mercado, 1996). Both are similar in proportion to the two sculptures of individuals dressed in eagle costumes which are currently on display in the Museum of the Templo Mayor. However, the recently discovered images represent Mictlantecuhtli, 'Lord of the World of the Dead', one of the most highly venerated gods of the Mexicas at the time of the Spaniards' arrival in Mesoamerica (col. pl. 5). In accordance with the religious concepts of the time, Mictlantecuhtli lived on the ninth level of the Underworld, a cold and dark place which was the final destination of all those who died of natural causes. This divinity was represented as a skeletal or partly defleshed being (fig. 11a).

The two sculptures discovered in the tunnels are standing upright and are slightly over life-size. Loincloths and sandals are the only garments that they are wearing. Their heads have dozens of perforations where natural curly hair and bits of paper were inserted, these being natural attributes of the deities of death. The sculptures have prominent ears and stains of yellow paint on the faces, symbolizing putrefaction. Their arms are bent forward with the claws poised for attack. Beneath the thoracic cavity there hang liver sculptures made from the left and right lobes of the liver and the gall bladder (col. pl. 5 and fig 11b). The Mexicas believed that the *ihíyotl*, a soul connected to the Underworld, darkness, the



11 a) Image of Mictlantecuhtli on a bench (Códice Magliabechiano, p. 76r)

- b) Mictlantecuhtli with curly hair and liver emerging from his thorax (Códice Tudela, p. 52r)
- c) Uniform of Tlacochcalcatl with liver emerging from his thorax (Matrícula de Tributos, Plate 10)
- d) *Tzitzímitl with a necklace made of hands and hearts, and with liver emerging from his thorax* (Códice Tudela, *p. 40r*). (Drawings by Fernando Carrizosa)

feminine, sexuality and reproduction could be found in this organ (López Austin 1988: 232–6 and personal communication). It is for this reason that not only Mictlantecuhtli, but other deities such as Mictecacíhuatl, Tzitzímitl and Tlacochcalcatl connected with the powers of the lower half of the cosmos, are shown as having enlarged livers (figs 11c and d).

At present we are carrying out an analysis of the materials and the data collected since 1981 with the intention of publishing a complete monograph on the House of Eagles.

Offerings from the sacred precinct of Mexico-Tenochtitlan

Other recent studies have concentrated on the analysis of the rich offerings buried beneath the Templo Mayor as well as in the nearby buildings and squares (fig. 12). This research can be divided into two main aspects. One of them has centred on the economic and political aspects of the Mexica society, to which end the provenance and means of obtaining plants and animals offered to the gods have been studied. Parallel to this, analyses have been made of the origin of the raw materials, manufacturing techniques and styles of the artefacts which served as offerings (López Luján 1994: 128–37).

As far as the origin of the materials from which the offerings were made is concerned, we know that 80 per cent of them are from outside the Basin of Mexico. They come mainly from the territories occupied by the tributary provinces of the Triple Alliance (Tenochtitlan-Texcoco-Tlacopan). The faunal remains are the most abundant; to date more than 200 species have been identified as coming from the temperate ecosystems of the Central Plateau, the tropical jungles, the coral reefs, the estuaries and the coastal lakes. In stark contrast, remains of flora and raw minerals are very scarce. Examples of the former are maguey (a kind of agave), copal incense, coniferous wood and rubber; examples of the latter are marine sand and fragments of jet, turquoise and green stones.

In the sample there is also an ample collection of human bone remains. A few belong to highranking individuals who were ritually buried after their bodies had been cremated; the large majority, on the other hand, belong to sacrificial victims who were beheaded or whose throats were cut.

Amongst the retrieved artefacts, it is the imported goods which arrived in Tenochtitlan by means of tribute, commerce, as gifts or through pillaging which stand out: sculptures in the Mixtec style, urns from Veracruz, ceramics and stone artefacts from the Puebla-Tlaxcala region, as well as a large quantity of copper bells and ornaments made of green stones whose origins are



12 The offerings were excavated and recorded very thoroughly. For example the excavation of Offering U lasted 3 months. (Photo: Leonardo López Luján, courtesy of INAH)



13 Field drawing of the main level in Chamber 2, one of the richest offerings found in the Great Temple. (Drawing by Alberto Zúñiga, courtesy of INAH)

not known. Also discovered was an impressive number of antiques unearthed during the fifteenth century from tombs and offerings belonging to societies which were not contemporary with the Mexica: a mask and several fragments of Olmec sculptures; hundreds of masks and figurines in the Mezcala style; dozens of pieces of Teotihuacan stonework and pottery; and a Plumbate ceramic vessel from southeast Mesoamerica. Surprisingly, it is the products of the Mexica themselves which are the most rare.

The second aspect of the research has been directed towards examining the contents and distribution of the offerings with the aim of reaching a better understanding of Mexica ideology. One of the most significant results has been the discovery and recording of the complex arrangement of the archaeological materials within the offering deposits (fig. 13). During the excavation we were able to note that each and every one of the offered objects was placed in a specific position. In fact the offerings were positioned in a way that was not at all haphazard, but followed very clear rules of spatial composition.

In a manner similar to verbal language, each object acted as a sign or symbol which, when combined with other objects, transmitted information. Unfortunately, for nearly two hundred years studies of the Mexica offerings have been limited to the analysis of their contents, thus neglecting their contextual relations. It is precisely for this reason that nowadays we know so much about the significance of many of the individual buried materials, but we still know nothing about the meaning of the whole. Or, to put it another way, we understand the letters and even the words, but not the syntax of the sentences.

With the aim of discovering the greatest number of regularities and deciphering the religious language contained in the offerings, we undertook several analyses of a sample of 8,000 objects belonging to 118 offerings. Initially, and with the aid of simple spatial and statistical techniques, it was possible to detect two types of archaeological syntax: an 'internal' and an 'external' one.

As far as the internal syntax is concerned, the offered objects were distributed in a particular order within the receptacles, conforming to the following arrangements:

- 1. The gifts followed imaginary axial lines in a horizontal direction. Those objects which, according to the Mexica world view, had opposing or complementary characters were situated at the ends of the principal axes. For example, in some boxes we found the images of the Fire God and the Rain God in opposed positions.
- 2. Objects having the same characteristics tended to be grouped together horizontally in units of 5, 9, 13 and 18 components, i.e. numbers relating to the Mexica concept of the cosmos.
- 3. The objects were placed vertically in levels or layers. Each level consisted of objects of the same kind, following taxonomical criteria which were also based on the indigenous world view. For example, in offering H the top level was made up of ceramics. The next one was occupied by the skeletons of a jaguar and a wolf. A bit further below there was another level which contained sacrificial knives. At the very bottom, on the lowest level, there were objects with an aquatic symbolism.

The offerings were buried in four different types of receptacle:

- 1. Within the constructional fill (composed of earth and stones), during the process of construction, remodelling or extension of the buildings
- 2. In large boxes made from carved stones, during the inauguration ceremonies of the temples
- 3. In recesses dug out beneath the floors, when the buildings were in full use
- 4. In cube-shaped urns made from volcanic rock (*tepetlacalli*), buried during the construction or inauguration of the building or while it was in use.

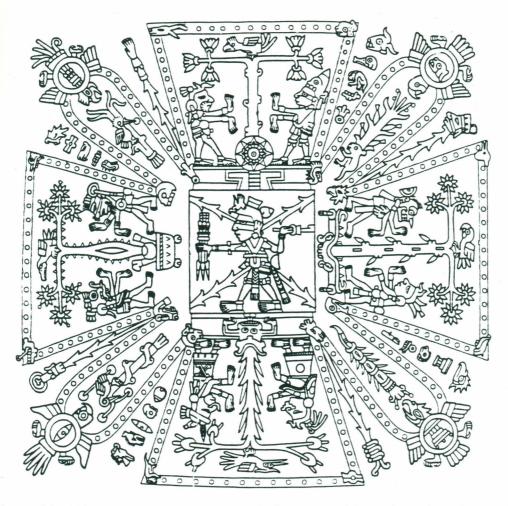
Let us look now at the external syntax. Both the position of the offerings and their quality and quantity depended on the importance of the constructions and the semiotic value of each part of the building. We could observe the following patterns:

- The differential importance of the constructions. Eighty-six offerings were found in the Templo Mayor, compared with only thirty-two offerings found in the neighbouring buildings and squares which were of much less importance.
- 2. Imaginary axial lines. The offerings were distributed along the principal architectural axes of the buildings.
- 3. Sculptural monuments. The Mexicas dedicated offerings to monuments incorporated into the architectural structures, such as the sculpture of Coyolxauhqui and the *chac mool* (reclining figure).
- 4. Horizontal location. The majority of the offering deposits were placed in the east and west facades of the temples, a distribution which has a solar significance.

In addition to the easily detectable regularities, there were others which required more complex statistical techniques to appreciate them. Thanks to the use of methods of numerical classification. taxonomy and spatial analysis, we were able to detect groups of offerings whose content and internal and external syntax were very similar. Some of these offerings were definitely buried at the same time. For example, during the construction of Phase III of the Templo Mayor, six offerings consisting of blue pots and beads made of green stone were buried around Tláloc's shrine (López Luján 1994: 214-23). In this way, the Mexica priests symbolized the water pots of the Rain Gods and positioned them so that they seemed to be pouring precious water onto the Earth's surface. This ceremony was a propitiatory act which conferred on the new building the qualities of the world of Tláloc: a hill from which clouds, rain and consequently the fertility of the land were to be generated. Other offerings, although they were not contemporary, formed part of similar rituals which had the same religious meaning. For example, after death, all individuals of the highest status were cremated and buried with the same type of offerings beneath the stucco floor of the shrine dedicated to Huitzilopochtli (López Luján 1994: 223–40).

Offerings as cosmograms

A considerable number of the offerings retrieved by the Templo Mayor Project were tiny scale models of either sections of the universe or of the complete universe, just as it was conceived by the prehispanic peoples of the Postclassic period. Adhering to a strict liturgy, the Mexica priests took great care in reproducing, with artefacts, animals and plants, the Earth's surface and, occasionally, the different levels of Heaven and the Underworld. It may be said that in this way, during the ritual ceremonies, they were repeating the cosmogonic actions of the gods. In this respect, offering number 16 was one of the most simple and obvious cosmograms (López Luján 1994: 172-92). It was discovered inside a small rectangular platform surrounded by four other platforms which face towards the northeast, the northwest, the southeast and the southwest respectively. Interestingly, the items that made up the offering followed the same spatial distribution as the aforementioned platforms. Found inside a small stone box was an image of Xiuhtecuhtli, 'Lord of the Year' and Fire God, surrounded by five beads of green stone (col. pl. 7). These beads were laid out in a uniform manner in the centre of the box and in the four corners (northeast, northwest, southeast, southwest). A prismatic obsidian knife also lay in the middle. To the east of this box there was a smaller one which was given the number 16-A. Inside there were also five beads made of green stone laid out identically to those in offering number 16: one in the centre and one in each corner.



14 Plate 1 of the Códice Fejérváry-Mayer represents the five regions of the earth's surface. The central rectangle – the centre of the universe – is occupied by Xiuhtecuhtli, the Fire God.

The particular distribution of the five architectural platforms and the five groups of beads represents the *quincunx*, the Mesoamerican symbol of the five regions that make up the Earth's surface (the four cardinal points and the Earth's centre). The image of Xiuhtecuhtli alludes to an extremely important deity who, according to sixteenth-century sources, lived at the centre of the universe. Xiuhtecuhtli was the Fire God in relation to the four cardinal points, just like the brazier that occupied the centre of each house and temple. For this reason he was invoked as *Tlalxictenticaé*, *Nauhiotecatlé*, that is, 'He who is filling the navel of the Earth, He of the Group of Four' (Sahagún 1988: 545). This idea is shown, among other places, in plate I of the *Códice Fejérváry-Mayer* (1994). I am referring to the representation of the universe which integrates the principles of the organization of time and space (fig. 14). In it can be observed the four directions of the universe occupied by the cosmic trees and the Lords of the Night. In the central box, the navel of the world, is Xiuhtecuhtli.

The dual offerings: Water and Fire in the Templo Mayor of Tenochtitlan

We will go on to see an interesting group of offerings which are characterized by a dual meaning which conforms with the double pattern of the Templo Mayor. With regard to this, let us remember that several indigenous myths indicate that double geographical accidents revealed to the Mexicas the site for erecting their Templo Mayor: two caves (Alvarado Tezozómoc 1949: 62–3) or two crags from which flowed two streams, one with blue water, the other with red water (Durán 1984: 44). Later, these two colours and their insistent duality would contribute their distinctive themes to the temples of Huitzilopochtli and Tláloc, and to the offerings buried there.

The eleven offerings that we will analyse were buried at Stage IVb of the Templo Mayor, i.e. around about AD 1469 (López Luján 1994: 240–98). Their distribution follows the principal architectural axes of the platform and observes a strict bilateral symmetry. Thanks to archaeological records, it is easy to prove that the eleven offerings formed part of the inauguration rituals whose aim was to repeat the divine act of creation and reproduce the universe to scale. Inside each offering box the objects were found to form six levels which reproduce to scale the three planes of the indigenous universe:

- 1. The deepest, having aquatic characteristics.
- 2. The middle plane, which had an earthly significance.
- 3. The highest, which was presided over by the Fire and Water Gods, and in which stand out the symbols of opposing and complementary natures, the insignias of Xipe Tótec and the skulls of decapitated human beings (fig. 15).

To start off with, those making the offerings placed a layer of marine sand at the bottom of each box. It is very plausible that this layer was meant to represent symbolically that part of the universe having aquatic characteristics: the Tlalocan or *Xalli itepeuhyan* ('spillway of sand'). The priest went on to create a second level with small snails and small seashells, and immediately on top a third layer made up of corals and larger snails. In relation to the meaning of these levels we should point out that the Mexicas saw marine animals as cold, damp beings coming from the Underworld. What is more, the snail was compared with the female womb and consequently acted as a symbol of fertility.

The fourth level was made up exclusively of the remains of fish and reptiles. However, those making the offerings only placed in them the external parts of these animals: the heads and skins of crocodiles and snakes; the heads and scales of fish; the cartilage of sawfish; the shells of turtles. Most of the fish lacked their spines and were represented by heads, skins and fins. The original image of this level would be that of a 'layer of skin' which physically and visually separated the deeper aquatic levels from the upper one. In my opinion, this intermediate level can be connected to Cipactli, the female sea monster which symbolized the Earth. It is sufficient to recall that Cipactli was represented iconographically by a crocodile, a sawfish or a snake.

The fifth level was the richest of all. It was made up of the images of gods, miniatures of divine paraphernalia, instruments for self-sacrifice and the skulls of beheaded individuals. Of all these objects it is the images of Xiuhtecuhtli (the Fire God) and Tláloc (the Rain God) which stand out. Both were always found at the top of the deposit, dominating the offering, and they were distributed in a regular fashion around the Templo Mayor. Three objects of divine paraphernalia also appeared recurrently: a sceptre in the shape of the head of a deer, the symbol of the sun, fire and drought; a sceptre in the shape of a snake connected with the currents of water and the fertilizing rays; and a chicahuaztli, the sceptre of the god Xipe Tótec. There were likewise a number of human skulls with cervical vertebrae included. It is worth mentioning that to date there are fifty-



15 Main level of Offering 61 in the Great Temple, dominated by the images of the Fire God and the Rain God. (Photo: Salvador Guilliem, courtesy of INAH)

six of these skulls, discovered in the corners and principal axes of the building.

The sixth and last level was found just above the stone slabs that covered the offering boxes. It was made up of ceramic censers which were ritually 'killed'.

One of the main keys to the meaning of this group is found in the presence of the skulls of beheaded individuals. As is well known, the religious custom of severing the head from the body dates back to the earliest times of Mesoamerica. Broadly speaking, it may be said that the peoples of Ancient Mexico associated the human head with the *tonalli* (soul), corn and the sun, and they practised ritual beheading at ceremonies which generally emphasized binary opposition: the ball game, the ritual of sowing and harvesting, the sacrifice of prisoners of war to renew the *tzompantli* (skull rack) and the consecration of the temples.

In relation to the last type of ceremony, many skulls with cervical vertebrae attached have been found in the corners of a number of religious structures dating from the Middle Preclassic period to the Late Postclassic period, from the Maya area right up to the Tarascan plateau. These findings are corroborated by indigenous pictography, in which it is not difficult to find representations of offerings of decapitated heads inside temples. At the beginning of the sixteenth century, the Nahua people and the Maya believed that the recently completed building received the 'soul' through the sacrifice and burial of a human being beneath its foundations.

But let us return to Tenochtitlan. Fortunately, the burial of the decapitated heads in the offerings of the Templo Mayor was recorded in sixteenthcentury sources. The Mexicas offered heads on the occasion of the inauguration of the extension of the main temple, a festival which always took place in *Tlacaxipehualiztli*, the month dedicated to the god Xipe Tótec. Sahagún mentions that during this festival war captives were sacrificed by having their hearts extracted and that afterwards their bodies were decapitated. Later, the warriors would dance for hours, holding the severed heads of their captives. Finally, according to Alva Ixtlilxóchitl (1975: 157), the heads were 'fitted into recesses specially made in the walls of the Templo Mayor', an obvious reference to the offering boxes.

It is extremely important that, as recorded in the colonial documents of the Crónica X tradition, *all* the inauguration ceremonies of the Templo Mayor took place at the same time of the year: during the month of Xipe Tótec. This month coincided with the spring equinox, the balancing point between day and night. Unfortunately, ever since Seler (1899) suggested for the first time that such a festival alluded to the spring renewal of vegetation, this idea has been unquestioningly reproduced over and over again. As Nicholson (1972) affirms, Seler's hypothesis is no more than a typical construction of Western logic which is completely lacking in proof.

By contrast, the sense of *Tlacaxipehualiztli* would seem rather to be connected to war, the creation of the Fifth Sun and the balancing of opposites. In agreement with Nicholson (1972), *Tlacaxipehualiztli* could be connected to the acquisition of war trophies. This idea is in keeping with the gloss in the *Códice Vaticano-Latino 3738* (1964–7: pl. X and p.30) which attributes to Xipe Tótec the creation of war and the fact that the Mexica kings attired themselves to resemble this god during battle.

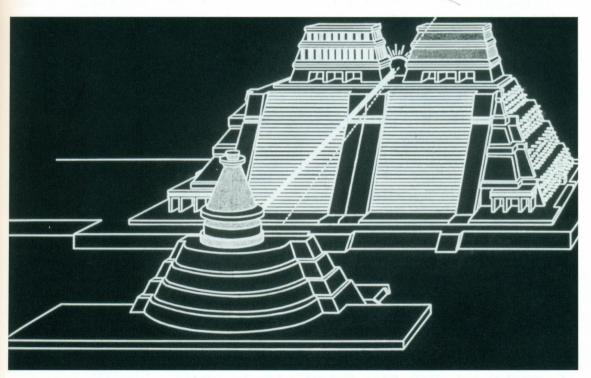
According to Graulich (1982), the ceremonies of *Tlacaxipehualiztli* were directly related to war (the joining of opposites), and with the birth of the Sun and with the harvest. After a detailed analysis of the myths and rituals, this author concludes that the festival re-enacted the myth of the origin of the Fifth Sun and the first war. It would refer to that moment when, after the world had been created and destroyed on four occasions, the gods met at Teotihuacan to undertake the fifth attempt, the definitive one. After rising above the horizon, the Sun ordered the massacre of 400 *mimixcoah* so that it could begin its daily movement. This is extremely interesting, since in this way the inauguration ceremony of the Templo Mayor and the burial of cosmogram offerings would have the intention of recreating the first act of the creation of the universe with the aim of ensuring its reality and longevity. Consecrating the temple signifies recreating the universe and time.

According to Kurath and Martí (1964), the rituals of *Tlacaxipehualiztli* represent the conflicts between Heaven and Earth, light and darkness, and the dry and rainy seasons. From this perspective it seems logical that the festival celebrating the consecration of this double temple dedicated to a solar deity and a water deity should take place during a month associated with the balancing of opposites. Discoveries by Tichy (1981) and Ponce de León (1982) support this idea. Both researchers, when calculating the orientation of the Templo Mayor, found that the sun rose exactly between the shrine of Huitzilopochtli and that of Tláloc on the 4th March each year, i.e. on the first day of the month of *Tlacaxipehualiztli*. This is revealing because, according to Tichy, the orientation of the prehispanic temples might indicate the first day of the festival of the god to which they were dedicated (fig. 16).

We should also add that in an offering belonging to this same group, Guzmán Camacho (1997) discovered that the fish which were buried there had been captured between the months of February and April.

I wish to refer to the political aspect of the events in *Tlacaxipehualiztli*. This aspect is apparent in the documents of the Crónica X Tradition. All inaugurations mentioned therein follow the same sequence of events:

1. Almost at the end of the work on the extension an expedition would be organized to conquer



16 On the first day of the month of Tlacaxipehualiztli the sun rose between the two shrines of the Great Temple. (Courtesy of the Mesoamerican Archive Research Project, Princeton University)

an independent domain in order to obtain prisoners destined to be sacrificed for the consecration of the Templo Mayor.

- 2. After the victorious return of the Mexica armies there would be a wait until the month of *Tlacaxipehualiztli*.
- 3. Governors of allied domains hostile to the Triple Alliance would be invited to the event.
- 4. During the festivities compatriots of the enemy lords invited would be sacrificed and their heads buried in the corners of the Templo Mayor.

A careful reading of these documents reveals an important fact: the Templo Mayor grew in relation to the growth of the empire. In this way, its various successive extensions glorified the military expansion and acted as ideological justification of the imperial politics. Each extension symbolized, celebrated and sanctified the inclusion of new tributaries within the Mexica domain. In circumstances where the armies of the Triple Alliance could not conquer an independent domain – such as the fruitless expedition to Michoacán – the inauguration would be postponed until a conquest could be made. This helps us to understand why the Templo Mayor increased in size at least twelve times in 130 years.

In conclusion. both the architectural configuration and the offerings of the Templo Mayor represented a scale model of the universe as it was conceived by the Mexicas. Each extension involved ceremonies in which the cosmogonic actions of the gods were repeated and the Underworld, the Heavens and the Earth were recreated. At the same time, the temple and the offerings provided a symbolic synthesis of the two basic aspects, opposed and complementary, of the Mexica religion: Fire and Water, elements whose union (atl-tlachinolli, 'water-blaze') was a metaphor for the cosmic war.

References

- Alva Ixtlilxóchitl, Fernando de (1975) Obras históricas, 2 vols. México: UNAM.
- Alvarado Tezozómoc, Hernando (1949) Crónica mexicáyotl. México: UNAM-INAH.
- Beyer, Hermann (1940) 'El jeroglífico de Tlacaélel', *Revista Mexicana de Estudios Antropológicos*, vol. IV, 161–4.
- Boone, Elizabeth H. (1987) 'Templo Mayor Research, 1521-1978', *The Aztec Templo Mayor*, E.H. Boone (ed.), 5–70. Washington, DC: Dumbarton Oaks.
- Broda, Johanna, Davíd Carrasco and Eduardo Matos Moctezuma (1987) The Great Temple of Tenochtitlan. Center and Periphery in the Aztec World. Berkeley: University of California Press.
- *Códice Fejérváry-Mayer* (1994) México: Fondo de Cultura Económica/Akademische Druck- und Verlagsanstalt.
- Códice Vaticano-Latino 3738 (1964–7) Lord Kingsborough, Antigüedades de México. México: Secretaría de Hacienda y Crédito Público, III, 7–314. Durán, Diego (1984) Historia de las Indias de Nueva

España e Islas de la Tierra Firme, 2 vols. México: Porrúa.

- Fuente, Beatriz de la (1990) 'Escultura en el tiempo. Retorno al pasado tolteca', Artes de México, nueva época, 9, 36–53.
- Graulich, Michel (1982) 'Tlacaxipehualiztli ou la fête aztèque de la moisson et de la guerre', *Revista española de estudios antropológicos*, XII, 215–54.
- Gutiérrez Solana, Nelly (1989) 'Diez años de estudios sobre el Templo Mayor de Tenochtitlan', *Anales del Instituto de Investigaciones Estéticas*, 60, 7–31.
- Guzmán Camacho, Ana Fabiola (1997) 'Análisis arqueoictiológico de la Ofrenda 23 del Templo Mayor de Tenochtitlan'. Tesis de Maestría en Biología. México: Instituto Politécnico Nacional, Escuela Nacional de Ciencias Biológicas.
- Klein, Cecilia F. (1987) 'The Ideology of Autosacrifice at the Templo Mayor', *The Aztec Templo Mayor*, E.H. Boone (ed), 293–370. Washington, DC: Dumbarton Oaks.

Kurath, Gertrude y Samuel Martí (1964) Dances of

Anahuac: The Choreography and Music of Precortesian Dances. Chicago: Aldine.

León-Portilla, Miguel (1987) 'The Ethnohistorical Record for the Huey Teocalli of Tenochtitlan', *The Aztec Templo Mayor*, E.C. Boone (ed), 71–96. Washington DC: Dumbarton Oaks.

López Austin, Alfredo (1988) Human Body and Ideology. Concepts of the Ancient Nahuas, 2 vols. Salt Lake City: University of Utah Press.

López Luján, Leonardo (1989) 'Ausgrabungen in Tlatelolco (Mexiko)', *Das Altertum*, vol. 35, no. 4, 249–53.

López Luján, Leonardo (1994) The Offerings of the Templo Mayor of Tenochtitlan. Niwot: University Press of Colorado.

López Luján, Leonardo (1995) 'Guerra y muerte en Tenochtitlan. Descubrimientos en el Recinto de los Guerreros Aguila', *Arqueología mexicana*, II, 12, 75–7.

López Luján, Leonardo and Vida Mercado (1996) 'Dos esculturas de Mictlantecuhtli encontradas en el Recinto Sagrado de Mexico-Tenochtitlan', *Estudios de Cultura Nábuatl*, 26, 41–68.

Matos Moctezuma, Eduardo (1988) *The Great Temple* of the Aztecs. Treasures of Tenochtitlan. London: Thames and Hudson.

Matos Moctezuma, Eduardo and Leonardo López Luján (1993) 'Teotihuacan and its Mexica Legacy', *Teotihuacan, Art from the City of the Gods*, K. Berrin and E. Pasztory (eds), 156–65. San Francisco: Thames and Hudson/The Fine Arts Museums of San Francisco. *Matrícula de Tributos. Nuevos estudios* (1991) México: Secretaría de Hacienda y Crédito Público.

Nicholson, H.B. (1972) 'The Cult of Xipe Tótec in Mesoamerica', *Religión en Mesoamérica*, XII Mesa Redonda, 213–18. México: Sociedad Mexicana de Antropología.

Ortiz, Agustín, Luis Barba, Leonardo López Luján, Karl F. Link and Luz Lazos (1996) 'Chemical analysis of Residues in Floors and the Reconstruction of Ritual Activities at Templo Mayor', Archaeological Chemistry. Organic, Inorganic and Biochemical Analysis (ACS Symposium Series 625), V. Orna (ed.). Washington, DC: American Chemical Society.

Ponce de León, Arturo (1982) *Fechamiento arqueoastronómico en el Altiplano de México*. México: Departamento del Distrito Federal.

Rojas, José Luis (1992) *México-Tenochtitlan. Economía y sociedad en el siglo XVI*. México: El Colegio de Michoacán/Fondo de Cultura Económica.

Sahagún, Bernardino de (1988) *Historia general de las cosas de Nueva España*, 2 vols. Madrid: Alianza Editorial.

Seler, Eduard (1899) 'Die achtzehn Jahresfeste der Mexikaner (1 Hälfte)', Veröffentlichungen aus dem Königlichen Museum für Völkerkunde, Berlin, 6, 58–66.

Tichy, Franz (1981) 'Order and Relationship of Space and Time in Mesoamerica: Myth or Reality', *Mesoamerican Sites and World-views*, E.P. Benson (ed.), 217–45. Washington DC: Dumbarton Oaks.

The Archaeology of Mesoamerica

Editors Warwick Bray Linda Manzanilla

Mexican and European Perspectives

The Archaeology of Mesoamerica

Mexican and European Perspectives

Editors: Warwick Bray and Linda Manzanilla with the editorial collaboration of Clara Bezanilla

Published for The Trustees of

The British Museum by

BRITISH MUSEUM IIII PRESS

© 1999 The Trustees of the British Museum

Published by British Museum Press A division of The British Museum Company Ltd 46 Bloomsbury Street, London WC1B 3QQ

A catalogue record for this book is available from the British Library

ISBN 0-7141-2529-6

Designed and typeset in Sabon by John Hawkins Book Design Printed in Great Britain by Cambridge University Press

Contents

Foreword: Mexico in the British Museum John Mack and Colin McEwan	7
1. The First Urban Developments in the Central Highlands of Linda Manzanilla	Mesoamerica 13
2. Water and Fire: Archaeology in the Capital of the Mexica I Leonardo López Luján	Empire 32
3. Place Signs in Mesoamerican Inscriptions and Codices Gordon Brotherston	50
4. The Indigenous Past in the Mexican Present John Gledhill	68
5. Ritual and Economy of the Preclassic Maya: Recent Evider from Cuello, Belize Norman Hammond	nce 83
6. The Gulf Coast Cultures and the Recent Archaeological Dis El Manatí, Veracruz Ponciano Ortíz Ceballos and Ma. del Carmen Rodríguez M	
7. Observations on the Late Classic Interregnum at Yaxchilán Nikolai Grube	116
Colour Plates	Between pp. 96 and 97

een pp. 96 and 97