ANYANG and SANXINGDUI Unveiling the Mysteries of Ancient Chinese Civilizations

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ROM
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This book has been published in conjunction with the travelling exhibition *Treasures from a Lost Civilization: Ancient Chinese Art from Sichuan*, organized by the Seattle Art Museum in collaboration with the Bureau of Cultural Relics, Sichuan Province of the People’s Republic of China. The exhibition then travelled to the Kimbell Museum of Art, Fort Worth, Texas (September 30, 2001–January 13, 2002); the Metropolitan Museum of Art, New York, New York (March 4–June 16, 2002). Its final venue was the Royal Ontario Museum (August 3–November 10, 2002).

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The discovery of the two sacrificial pits of Sanxingdui in 1986 in Guanghan, Chengdu, was unquestionably one of the great events in Chinese archaeology of the twentieth century. The Royal Ontario Museum is very fortunate to be able to present the treasures of Sanxingdui in the exhibition Treasures of a Lost Civilization: Ancient Chinese Art from Sichuan (August 3–November 10, 2012).

The Seattle Art Museum, which organized the exhibition’s North American tour, has produced a magnificent and comprehensive exhibition catalogue: Ancient Sichuan: Treasures of a Lost Civilization, edited by Robert Bagley. Exclusively for the Toronto showing of the exhibition, the ROM has added eleven artifacts especially requested from the Sanxingdui Museum. The ROM has also added from its own collections a selection of Late Shang artifacts collected in the 1920s and 1960s from Anyang, Henan province. This book is a supplementary catalogue to introduce the ROM component of the exhibition.

Many people were involved in the early development of the exhibition, and their kind assistance was essential in bringing the show to Toronto. Dr. Jay Xu, Foster Foundation Curator of Chinese Art at the Seattle Art Museum, worked vigorously for years to have these artifacts exhibited in North America. Ms. Mary Boyd, former Consul of Cultural Affairs at the Canadian Consulate-General in Chongqing, first brought the possibility of this exhibition to the ROM’s attention. During the two long years of preparation for hosting the exhibition, the ROM received great support and assistance from the following people: Mr. Xiang Xiaowei and Ms. Fay Huang, Consuls of Cultural Affairs at the Chinese Consulate-General in Toronto; Mr. Craig Wilson, Head of Mission at the Canadian Consulate-General in Chongqing; Ms. Chaire Hout, Cultural Councillor at the Canadian Embassy in Beijing; Ms. Wang Liemei and Ms. Sheng Weierzi from the Foreign Affairs Office of the State Administration of Cultural Heritage in Beijing; and Mr. Liang Xiaohong, Mr. Zhao Chuanzong, and other associated officials at the Sichuan Cultural Bureau. Indeed, through their combined efforts, the show has become a major cultural collaboration between China and Canada. Finally, the collective efforts of the ROM exhibition project team, including senior management and supporting staff, have made the success of this exhibition possible.

The purpose of this book is two-fold: it serves as a guide to the ROM objects that complement the travelling exhibition, and it presents the most up-to-date research on the two Civilizations. This book is the result of many years of dedicated research, raising our mischievous toddler, Simon, while I was away on field trips, and to whom this book is dedicated. Special thanks must go to the talented and responsible editor, Andrea Gallagher Ellis, who made this a better book. Thanks are also extended to organizations and people who assisted me in getting the book to press. This publication was made possible with funds that were generously provided by the Louise Hawley Stone Charitable Trust within the ROM Foundation. The ROM’s publication committee and the ROM Foundation were supportive in expeditiously reviewing the project and processing the publication grant application for this book. The ROM’s Publications department assisted me a great deal in quickly transforming my manuscript into a book; Glen Ellis coordinated the production and printing; and Virginia Morin designed and produced the catalogue. Photographs were taken by Brian Boyle, and the Glossary and Exhibition Guides were prepared by Jack Howard and Kang-Mei Wang from the NEAC Library. Members of the Department of Museum Volunteers Acquisition and Research Fund, as well as the ROM’s Department of Museum Volunteers Acquisition and Research Fund, assisted me in many ways. Additional thanks are due to Dr. Klaas Ruitenbeek, Senior Curator at the ROM, Louise Hawley Stone Chair of Far Eastern Art, and co-curator of the exhibition, for many great ideas and suggestions that have been incorporated in this book. Sara Irwin, who knows the ROM’s Anyang collection better than anyone else in the Museum, contributed the text for most of the bronze catalogue entries as well as the description of the ROM’s horse and chariot. Patty Proctor and Dr. Doris Dohrenwend made many insightful comments on the ceramics and jade chapters, respectively. Jeannie Parker generously assisted me in exhibition preparation and writing. Jack Howard and Kang-Mei Wang from the NEAC Library helped with the Glossary and patiently tracked down reference books during my research. I would like to offer my appreciation to Dr. Chen Xingcan, Dr. Fang Hui, Dr. Junko Namba, and Dr. Anne Underhill for taking the time to read and comment on the manuscript.

While I assume full responsibility for the contents of the book, I find in retrospect that its completion was more a team than an individual effort. My colleagues at the Royal Ontario Museum were generous with their support and assistance, and their professionalism and scholarship have greatly added to this book. First off, Dr. Klaas Ruitenbeek, Senior Curator at the ROM, Louise Hawley Stone Chair of Far Eastern Art, and co-curator of the exhibition, has been a remarkable driving force for the organization of the exhibition as well as an inspiration for this publication. Thanks to him for many great ideas and suggestions that have been incorporated in this book. Sara Irwin, who knows the ROM’s Anyang collection better than anyone else in the Museum, contributed the text for most of the bronze catalogue entries as well as the description of the ROM’s horse and chariot. Patty Proctor and Dr. Doris Dohrenwend made many insightful comments on the ceramics and jade chapters, respectively. Jeannie Parker generously assisted me in exhibition preparation and writing. Jack Howard and Kang-Mei Wang from the NEAC Library helped with the Glossary and patiently tracked down reference books during my research. I would like to offer my appreciation to Dr. Chen Xingcan, Dr. Fang Hui, Dr. Junko Namba, and Dr. Anne Underhill for taking the time to read and comment on the manuscript.

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And finally, my sincere gratitude goes to my wife, Alison Wang, who showed remarkable patience during my research, raising our mischievous toddler, Simon, while I was away on field trips, and to whom this book is dedicated.
Treasures from a Lost Civilization: Ancient Chinese Art from Sichuan is a major travelling exhibition that showcases nearly two hundred astonishing artifacts unearthed from more than a dozen archaeological sites in Sichuan province, China. Most of these discoveries were made in the past two decades. Most prominent are the finds from Sanxingdui, not far from the present-day provincial capital of Sichuan at Chengdu. The exhibition presents the history of a thriving civilization at Sanxingdui of the second millennium BC—a civilization that until recently was unknown.

The history of ancient Sichuan is being rewritten in the light of these discoveries. Previously, scholars generally regarded the Sichuan basin as a cultural backwater—an area that was greatly under the shadow of cultural dominance from central China until the Qin-Han dynasties’ unification (221 BC–AD 220). It had long been the conventional view that Chinese civilization was based solely on the continuity of cultural developments emanating from the Middle Valley of the Yellow River. This notion, formed early in the search for the origins of Chinese civilization, when a late Shang capital, Yinxu, was excavated in the 1920s at Anyang, northern Henan province of China, persisted for decades (Fig. 1).

It was during the 1980s, when a great number of archaeological discoveries revealed parallel paths of cultural advancement outside the conventional core of Chinese civilization, that Sichuan rose to a place of prominence in the study of China’s ancient history.

The dates of oracle-bone inscriptions have established that the written history of ancient China began in 1300 BC at Anyang, but these records deal only with central China since the Late Shang dynasty. For a region such as Sichuan, where textual records written by local inhabitants did not appear until after the beginning of the first millennium AD, knowledge of history must rely mainly on archaeological evidence, which was very sketchy for Sichuan before about 1980. When systematic archaeological investigations began in 1980, therefore, it was reasonable to expect that the history of ancient Sichuan would be reinterpreted in accordance with the new discoveries. The cultural history of Sichuan, like that of China’s other cultural regions, is conventionally reconstructed with reference to the long-established and most familiar chronological framework of central China (Fig. 2).

The earliest occupation in Sichuan can be traced back to Palaeolithic times, although there are only a few sites as old as that. Neolithic settlements more than 4000 years old are very scattered and their contexts are poor. In 1995, Sichuan archaeologists discovered a walled settlement at Baodun, 5 km northwest of Xinjin township (Sun and Wang 1999; Chengdu 1997; Chengdu et al. 2000). Excavation at the Baodun site in 1996 revealed house structures, burials,
and a great quantity of pottery that are manifestations of a local tradition. In the following years, four additional walled sites were identified nearby. Within one of these walled sites, Pixian, archaeologists discovered the foundation of what appears to be a large ceremonial structure (Wang and Jiang 2000:150–55), 50 m long by 11 m wide, with five features thought to be altars that were made of pebbles. These findings clearly represent a previously unknown cultural complex, now called the “Baodun Culture” and dated to around 2500 BC (Jiang and Li 2002:58–85). The Baodun Culture provides the earliest evidence for development of complex settlements in Sichuan independent of but parallel to developments in central China, where the Late Henan Longshan Culture was represented by dense aggregations of settlement in a somewhat hierarchic system (Liu 1996; Shao 2000). These complex Neolithic societies gave way to the rise of a state form of society in both regions around 2000 BC (Fig. 2).

In central China, the Erlitou Culture near Yanshi city of Henan province arose at the onset of the second millennium BC. Substantial remains of palace structure complexes discovered here, the first ever found in China, indicate a measure of centralized organization (Zhongguo 1997). Most Chinese scholars regard the Erlitou site as a centre of the Xia dynasty, which lasted until the seventeenth century BC, when it was replaced by Shang Culture.

Shang, centred on the present-day city of Zhengzhou during its early period, then later switching to Anyang, was the first dynasty to have a fully developed writing system—oracle bone texts—and to leave written records that prove its historical existence.

The Shang dynasty gave way about 1046 BC to the Western Zhou, which in turn gave way to the Eastern Zhou (771 BC). The Eastern Zhou was further divided into the Spring and Autumn period (771–476 BC) and the Warring States period (475–221 BC), and was followed by the Qin-Han dynasties unification (220 BC–AD 220).

The discovery of the Sanxingdui site in Guanghan, 41 km north of Chengdu city, capital of Sichuan, revealed the first formation of a state society in the Sichuan basin. The Sanxingdui Culture has been recognized as a distinct early Bronze Age cultural complex, and today there is no argument that the Sanxingdui site was the centre of a highly advanced state in Sichuan during the second millennium BC. The study of Sanxingdui materials in the following chapters strongly suggests that there was early contact between Sichuan and central China, although the development of the Sanxingdui bronze culture is thought to be indigenous. The Sanxingdui Culture represents the earliest phase of the Bronze Age in Sichuan, and the breathtaking artifacts recovered from two sacrificial pits at the Sanxingdui site attest to high accomplishments in bronze technology at this stage. Selected objects from Sanxingdui (gold, bronze, jade, and stoneeware) comprise half the exhibition Treasures from a Lost Civilization: Ancient Chinese Art from Sichuan; in addition, eleven Sanxingdui objects (six ceramics, three bronze heads, one small bronze human figurine, and one small jade blade) not part of the travelling exhibition are on loan to the ROM from the Sanxingdui Museum exclusively for the Royal Ontario Museum venue.

During the 1980s, a cluster of Bronze Age dwelling sites was discovered in the heart of Chengdu city. This cluster is collectively named the Shi’erqiao Culture after the central site—Shi’erqiao—which is surrounded by Xinyichun, Fangchijie, Fuqinxiao, Junpingjie, Zhihuijie, and Minshanfandian; all share a similar cultural tradition represented by pottery production and building structure features (Sun 2000a; Sichuan et al. 1987b; Jiang and Li 2002:168–219). These sites, which occupy an area of 6–7 km², are considered to be a large centralized settlement. The Shi’erqiao Culture is recognized as a cultural continuation derived from Sanxingdui, placing the centre of this state at Chengdu at the dawn of the first millennium BC, when power shifted from Shang to Western Zhou in central China.

In the fall of 2000, there was a remarkable discovery from Chengdu city: archaeologists found the early Bronze Age settlement of Jinsha. Jinsha stunned the world with its unique golden masks, bronze figurines, and carved jade similar to those from Sanxingdui but of a quality and quantity surpassing the Sanxingdui artifacts (Zhu et al. 2001a, 2001b; Sung 2000a; Sichuan et al. 1987b; Jiang and Li 2002:168–219). These sites, which occupy an area of 6–7 km², are considered to be a large centralized settlement. The Shi’erqiao Culture is recognized as a cultural continuation derived from Sanxingdui, placing the centre of this state at Chengdu at the dawn of the first millennium BC, when power shifted from Shang to Western Zhou in central China.

Fig. 2. Bronze Age cultures in Sichuan and Central China.
Jinsha site at Chengdu, showing stoneware artifacts for the exhibition. To date this is the largest tomb recovered from the Shu State during the Warring States period; thus, with parts of the wooden shafts and handles still remaining. Twenty-four pieces of this large bronze setting were selected for the exhibition. The tools were well preserved, were five each of most of the bronze vessels and tools, whether to reflect the status of the owner, or local burial customs, preserved 188 bronzes, including ritual vessels, weapons, tools, and musical instruments. Of great interest is that there compartments, once likely filled with grave goods, were empty. Fortunately, a small pit underlying the inner coffin wood inner coffin and five storage compartments. The tomb had been looted many times in the past, and the storage a burial pit 10.45 m long by 9.2 m wide. A large wooden outer coffin, about 8.3 m long by 6.7 m wide, contained a the foundation of Sanxingdui development.

The bronzes cultures that existed in Sichuan during the time of Western Zhou and early Eastern Zhou rule in central China have been recently defined as the Anyunchan Culture, which comprises a number of large settlements in the Chengdu area (Sun 2000a, 2000b). The two famous bronze hoards found at the Zhushui site in Pengzhou are affiliated with this cultural manifestation. The two hoards, found twenty-five metres and twenty-one years apart (one discovered in 1959, the other in 1980), yielded a total of forty marvellous bronze vessels and weapons (Sichuan and Pengxian 1981; Song 1998:54-55). Each hoard of bronzes was stored in a gigantic pottery gang (i.e buried underground, twenty-one pieces in the one found in 1959 and nineteen pieces in the one found in 1980. Remarkable discoveries in these two contemporary hoards were two bronze zhi wine vessels, with inscriptions indicating that the bronzes were trophies awarded by King Wu of Western Zhou to “Shu” people. The inscriptions imply that Shu people from Sichuan were allied with Zhou troops in a battle. They are the first written evidence from central China to identify western Sichuan as “Shu.” Designs and temporal styles of the bronze vessels are similar to the two hoards pointed to the burying date as early Eastern Zhou. These bronzes display strong elements of a distinctive local tradition; ten of these pieces have been selected for the exhibition.

The latest phase of the Sichuan Bronze Age is the Qingyanggong Culture (Sun 2000a, 2000b), which is exemplified by a number of burial materials dating to the Warring States period. Among these, a large tomb found in 1980 at Majuixiang in Xindu County is one of the most important. The tomb has a ramp 8.82 m long leading from the west to a burial pit 10.45 m long by 9.2 m wide. A large wooden outer coffin, about 8.3 m long by 6.7 m wide, contained a wooden inner coffin and five storage compartments. The tomb had been looted many times in the past, and the storage compartments, once likely filled with grave goods, were empty. Fortunately, a small pit underlying the inner coffin preserved 188 bronzes, including ritual vessels, weapons, tools, and musical instruments. Of great interest is that there were five each of most of the bronze vessels and tools, whether to reflect the status of the owner, or local burial customs, or something else again is not known. It seems that the tomb owner was involved with carpentry, because there were sets of carpenter’s tools, the first of their kind to be found in China, also five of each type. The tools were well preserved, with parts of the wooden shafts and handles still remaining. Twenty-four pieces of this large bronze setting were selected for the exhibition. To date this is the largest tombs recovered from the Shu State during the Warring States period; thus, the owner is assumed to be a ruling member of the state. It has been suggested that the burial customs associated with this tomb point to external influences from the Chu State in the east (Song 1998:73-77).

An exceptional group of three burial materials at Xiaotanxian, whose cultural identity is affiliated with the Qingyanggong Culture, was found in 1972 in the suburbs of Chongqing city, east of Chengdu; these were earthen-pit tombs with wooden coffins. One of them yielded a fourteen-piece musical instrument known as a biau bell, which is included in the exhibition (Bagley 2001, cat. no. 76). The other burial bronzes, especially the weapons, from these tombs indicate the local traditions of the Ba State in eastern Sichuan. The exhibition includes a number of traditional Ba-Shu weapons, some with emblems meaningful only to local inhabitants at the time, selected from burials and sites of the Warring States period. One of the burial bronzes, a pictorial biau wine vessel (see Bagley 2001, cat. no. 75) recovered from a tomb at the Baoshan No. 10 Middle School of Chengdu in 1988, is identical in all respects to one currently displayed in the ROM T. T. Tsui Galleries of Chinese Art.

During the Qin-Han dynasties, the cultures of Sichuan were rapidly integrated into the mainstream of Chinese civilization as a result of political unification. Although strong local elements remained, the artwork of Sichuan shows a great deal of similarity to that of other regions of China; cultural uniformity had become a tendency.

The archaeological treasures of Sichuan on display are masterfully analysed and described as ancient artworlds in Ancient Sichuan, the catalogue that accompanies the travelling exhibition (Bagley 2001). It is essential and necessary, however, to understand these objects not only in terms of ancient art, but also in their rich archaeological context of cultural diversity on the one hand, and regional integration on the other. It is therefore worthwhile to examine and interpret the artifacts using a comparative approach. The ROM’s own collections provide an opportunity for an archaeological comparison of the newly emerging cultures of ancient Sichuan with the well-known cultural manifestations from central China.

The ROM holds one of the finest collections of ancient Chinese artifacts outside China. The collection was assembled mainly in the early part of the twentieth century and has been carefully augmented since. For the Toronto showing of Treasures from a Lost Civilization: Ancient Chinese Art from Sichuan, several dozen Shang dynasty artifacts have been added from the ROM’s Far Eastern collections. These objects were reportedly collected from Anyang, Henan province. Most were acquired in the 1920s and 1930s, when the Anyang site was beginning to be known as an important Shang city ruin. These artifacts, which are the focus of this catalogue, strengthen the archaeological context of the exhibition and provide an opportunity to compare the art and explore the relationship between the civilizations of Anyang and Sanxingdui.
2. Archaeology of Anyang and Sanxingdui: The City Ruins

The discoveries of the Anyang and Sanxingdui sites, although they were made at about the same time, more than seventy years ago, were two independent events. In 1929 a local family from the small village of Yueliangwan in southwestern China accidentally discovered a large hoard of ancient ritual jades and stone objects. This find was the first evidence of the existence of the Sanxingdui site. At Anyang in central China, inscriptions found on tortoise shells and ox scapulas led to the first scientific excavation there in 1928. Because the inscriptions clearly indicated that the site was a later capital city of the Late Shang dynasty (1300–1046 BC), Anyang became the focus of Shang archaeology. The city ruin and its cultural materials yielded rich evidence of Bronze-Age civilization in ancient China. A profile of Shang China emerged: a powerful and complex society centred at Anyang gave rise to the development of derivative regional cultures as Shang aggressively and radically expanded its territories.

Since the beginning of 1980, archaeological discoveries have revealed a great number of early centres of bronze industry outside Anyang. The importance of Anyang was clear from the time of the site’s discovery, but it would be a long time before Sanxingdui was recognized as a major urban centre of the early Bronze Age. The first excavation at Sanxingdui was undertaken in 1934, on a small part of the site near the jade hoard. Cultural materials recovered from this early investigation convinced scholars to suggest that Sanxingdui was a regional cultural manifestation (Graham 1934; Lin 1945; Zheng 1943). Nearly twenty-five years passed before investigation resumed in 1958; Sichuan archaeologists determined that material culture was much richer and more complex than previously thought (Feng and Tong 1979), and therefore undertook a small-scale excavation in 1963 near Yueliangwan village. Unfortunately, the report of this investigation was not made available until 1993 (Ma 1993). A breakthrough resulted from the 1980 and 1981 field seasons, when a large-scale excavation took place at Sanxingdui. A number of distinct structural remains and a large quantity of artifacts were recovered, providing a basis on which archaeologists would define the “Sanxingdui Culture” as a distinct cultural identity in 1987 (Sichuan 1999). The fieldwork has continued annually since, on an ever-increasing scale, furnishing data about chronology, cultural materials, site size, space distributions, etc. These investigations resulted in the extraordinary discovery of two sacrificial pits, which were filled with nearly two thousand amazing finely crafted objects (Sichuan 1999), including bronze figures, masks, decorative ornaments, and ritual jades.

1 The chronology and dates used throughout this book are based on the results of the recent Xia-Shang-Zhou Chronological Research Project (see Xia-Shang-Zhou 2000).
This find was the first indication that this mysterious local culture had achieved a high level of sophistication. The discovery confirmed early speculations of the existence of an unknown civilization of the second millennium BC in Sichuan. The field investigations in the late 1980s revealed the ruins of the city walls, which clearly define the ancient limits of Sanxingdui and show it to embrace all locations previously investigated at the site (Chen and Chen 1987; 1990; D. Chen 1991). Following this discovery, which established a complex society at Sanxingdui, the site has attracted wide international interest. The focus of archaeological research has been on the two pits in the context of the city ruins, and on the relationships between this regional culture and contemporary Shang Culture in central China (Huang 2001a; Li 1997; Yu 1996; Zhou 1996).

At Anyang, field investigation has been continuous since the first excavation in 1928, except for interruptions during times of war from 1937 through the 1940s and during the Cultural Revolution in the 1960s. About seventy fieldwork seasons have accumulated massive amounts of archaeological data. The building remains recovered include dozens of large structure complexes, more than a hundred small-to-moderate-sized house foundations, thirty-to-four large tombs with ramps, about a hundred moderate-to-large-scale tombs that may have once belonged to royal or noble families, three bronze foundries, two bone workshops, one jade workshop, and five pottery kilns. In addition, clan burials, sacrificial pits (including horses and chariots), and boards have numbered more than six thousand, while artifacts recovered to date number in the hundreds of thousands and include bronzes, jades, stone wares, pottery wares, carved bones, ivories, and oracle bones unearthed from numerous settlement areas (Zhongguo 1994; Yin and Cao 1998). The most remarkable discovery, made in 1976, is the tomb of Fu Hao, whose owner is clearly identified in both bronze inscriptions and oracle-bone inscriptions as a favourite consort of King Wu Ding (Zhongguo 1980). This rectangular earthen pit burial, moderate in size, was the tomb of Fu Hao’s tomb (M5). It should be noted that the tomb is much more extensive than previously thought: it was most likely about 6 km from east to west and 5 km from north to south, for a total area estimated at 30 km² (Zhongguo 1994: Fig. 3). According to surviving texts, the city was established as a capital by Pan Geng, the 20th king of the Shang dynasty, at the end of the fourteenth century BC, and was the home of the last twelve kings (eight generations) over a period of 253 years (Xia-Shang-Zhou 2000:60). Almost all the large tombs with ramps, which were likely the tombs of Shang kings, were looted, making it difficult to match them to individual historical personages; however, the tomb of Fu Hao provides direct evidence for the presence at Anyang of Wu Ding, the 23rd king of the Shang dynasty.

The centre of the city was located on a raised terrace, where the Huaihe River makes an almost ninety-degree turn from east to south at the modern villages of Xiaotun and Huayuanzhuang. There was a man-made moat about 10–20 m wide and 5 m deep at both the western and the southern limits, while the river formed a natural boundary on the eastern and northern sides. The enclosed area, approximately 1100 m from north to south by 650 m from east to west, has been identified as a royal palace and temple court; in this enclosure, more than fifty large hangtu (rammed earth) platform foundations were excavated. The nature of the building complexes and the way they were laid out in relation to each other make it certain that they represent royal palaces and ceremonial temples (see Li 1977; Zhongguo 1994:51–80). A number of sacrificial pits were found surrounding the temple structures. In the northwest quarter, there were some large tombs, including Fu Hao’s tomb (M5). It should be noted that the majority of oracle bones found over the years came from the southern part of the enclosure.
The royal tombs were located in the Houjiazhuang highland, called Xibeigang, 2 km northwest of the royal court, on the north shore of the Huanhe River. Within an area of about 450 m by 250 m there were a dozen large tombs with ramps (some with four ramps), associated with more than 1400 sacrificial pits containing human and animal remains as well as object offerings. These burials were laid out in a regular pattern, indicating customary burial practices. Residential areas and workshops were densely distributed immediately outside the palace and temple enclosure. Clay burials were found in clusters in association with residential occupations, although usually outside of inhabited areas, and in the western part of the ruin.

Archaeological evidence to date suggests a gradual expansion of Anyang over four major developmental periods. In the early part of Period I, occupation appears to have been limited to the Xiaotun area, and no royal structures are apparent. At the end of Period I, large royal complexes were being built. The areas of inhabitation had greatly expanded and bronze foundries were established. By this time the area occupied by present-day Xiaotun had become the centre of political activity. Entering Period II, the city had grown to about 12 km². The majority of royal complexes and temples were constructed at this time, and the mausoleum at the southern and western limits of the royal enclosure were built. Most royal and noble tombs, including both the tomb of Fu Hao and the recently discovered Huayuanzhuang M54, belong in Period II. As Period II progressed, bronze workshops increased in size and number. During Period III and Period IV, Anyang was continuously expanding until it covered an area nearly three times as large as in Period II. The palace and temple complexes continued to grow, and workshops of all kinds reached their height of production. During Period IV, the number of residential sites and burials increased dramatically, evidence of a rapid increase in population.

Two facts about the ruins at Anyang have mystified archaeologists and historians ever since the site was first identified. First, no city walls have ever been found, even though this ruin is larger than all known walled cities of the Shang dynasty. Some believe that the walls of Anyang are yet to be discovered, suggesting that Anyang may have been much larger than the presently known ruins (Zhu 1999:47–60). But others suggest that, given the invisible power of the Yin reign, walls were not needed at Anyang, implying that the Late Shang had the power to control the vast landscape surrounding Anyang (Guo 1988; Wang 1991; Zhang 1987). Indeed, it is possible that Shang civilization had spread far and wide, superimposing Shang elements on local cultures. There is certainly no doubt that Anyang was a political and religious centre, whether or not city walls were ever built. However, the lack of walls for a city of this scale remains a mystery, given that, except for Erlitou and Fenghao, every other large ancient Chinese city so far was walled.

Second, there are no royal structures and as yet no royal tombs dated to the first three kings at Anyang (1300–1250 BC). The oracle-bone writings at Anyang do not record these reigns, but begin with the reign of Wu Ding, the 23rd Shang king. This conflicts with what historians have long believed—that King Pan Geng, the 20th Shang king, moved the Shang capital to Anyang, or Yin, as they called it. It has been suggested that there were five moves of the Shang capital before the 20th king. Previously, archaeologists had discovered the ruins of three Shang cities: Erlitou, Yanzhou, and Zhengzhou; one or more of them are believed to be an earlier Shang capital, although no proof in the form of direct written records has yet been found. None of the three previously discovered Shang city ruins dates to the period of Pan Geng’s reign; archaeologists wondered, therefore, where the king moved his royal court if not to Anyang. The solution to this mystery may come from a stunning new discovery: in 1999, following three years of surveys immediately outside the Yinxu limit, north of the Huanhe River, a walled ruin of Shang was identified. Then, in the fall of 2001, a large royal complex, likely a palace structure or temple, was excavated, and, according to the excavators, it is larger than any of the royal structures at Anyang (J. G. Tang, personal communication). This complex, along with a number of residential and burial sites, is dated to the Middle Shang period, prior to King Wu Ding. The ruin, now named the Huanshi Shang city, is square in plan with each side being 2150 m long, for a total area of 4.6 km², making it the largest walled Shang city ever found (Tang et al. 2000). The excavators believe that this city ruin may have been the new home for Pan Geng and the two kings who succeeded him. It is possible that King Wu Ding moved the royal court out of this walled site, expanding the city to the vast area immediately south of the river. Of course, this view needs to be confirmed with further investigations, but the discovery of this walled ruin near Anyang will no doubt shed new light on the overall city development of the Middle to Late Shang at Anyang.
THE SANXINGDUI CITY RUIN

The Sanxingdui ruin is so far the only known ancient walled city of the Bronze Age in southwestern China. The city layout is approximately square, with the north side bounded by the Yazi River and walls built on the other three sides (Fig. 4). The Sanxingdui ruins measure approximately 1.8 km by 2 km, or 3.6 km², a little smaller than the Huabei Shang city. The remains of the walls measure about 1090 m on the east side, 1150 m on the south side, and 650 m on the west side. A man-made moat, 20–30 m wide, outside the walls was connected to the Yazi River in the north, and in the south to the Mamu River, which runs through the middle of the city. There are a few segments of walls within the city, possibly partitions that divided the city into sections. The wall remains are about 40 m wide at the base, tapering to 20 m wide at the top. The walls were built mainly using the hangtu (tamped earth) technique, which was a common method of construction in the Central Plain (Fig. 5). Some of the walls were built of sun-dried clay bricks, a more advanced technique.

Current data suggest that the city may have had a regular layout in plan, like other early cities of ancient China, although archaeological evidence is far from conclusive. It is also suggested that raised terraces near Yueliangwan in the north part of the city, where a number of jade hoards were found previously, might have been ideal places to build palaces or royal structures, although systematic surveys have yet to be carried out. The royal temples and ceremonial structures were likely located in the south part near Sanxingdui (Three Star Mounds) village, named after what were originally three small mounds in the immediate vicinity. The remains of the mounds have been dated by archaeologists to the Sanxingdui culture, and the mounds are assumed to have been built for ritual purposes, such as altars. Other similar mounds may have existed previously. The two treasure-filled sacrificial pits were found in this area, supporting the notion that this section of the city served a ceremonial function. Dwelling sites were concentrated between these two possible royal sections in the northern and southern areas. Judging from the large quantity of house remains, buildings were likely made with bamboo and wooden posts, earth walls, and straw roofs; some of the houses had floors raised off the ground. A few burials, apparently belonging to residents here, were associated with the settlements, but the main concentration of burials was found in the northwest, outside the city ruin. Bronze foundries and stone workshops, important components of ancient cities, were clearly identified in the northwest corner near the palatial area (Sun 2000b, 2000c).

Archaeological evidence points to the earliest date of the wall construction as around the eighteenth to seventeenth century BC; the city was occupied as a political and religious centre for about five or six hundred years. In terms of the history of central China, the active period of the Sanxingdui ruin extended from the Middle Erlitou Culture to the Yinxu Period II of Late Shang. The cultural context of the Sanxingdui ruin is, obviously, far from clear when compared to what we know from Anyang, because only a few of the site’s features have been thoroughly excavated—some wall sections, a small number of dwellings and burials, and of course the two sacrificial pits.

The two pits are about 30 m apart and are similar in size and shape. Pit 1 is the larger, about 4.5 m long and 3.4 m wide, while Pit 2 is slightly longer but narrower, 5.3 m by 2.3 m; both have a depth of 1.5 m. Pit 2 yielded 1300 objects, about triple the number found in Pit 1. One of the most remarkable objects is a unique 3-m-tall bronze figure of a man standing with his arms crossed in front, possibly representing a king or a religious leader of this state. A golden tube found in Pit 1 was used as a wrap or casing, possibly for a wooden pole or staff, which no doubt was a symbol of power.
Sanxingdui Pit 2 and artifacts on site

or a token of authority. A tree made entirely of bronze was found in Pit 2, it stands about 4 m high after reconstruction. Other remarkable objects are bronze heads, three of which were embellished with gold foil, and large masks. The exaggerated facial expressions depicted on the figures, heads, and masks are extremely puzzling; however, they are undoubtedly sacred objects that served formal religious purposes. Bronze vessels, jade carvings, and other ornate objects also indicate ritual activities.

Perhaps the most intriguing aspect of the pits is the manner in which the objects were buried. It is clear to archaeologists that the objects were intentionally broken into pieces and burned before being deposited in the pits. Few of the bronze objects were found intact, but all of the pieces are present, so that objects can be reconstructed or restored. The most notable phenomena is that about 3 m³ of burned animal bones were identified in Pit 1, and in this pit ritual jade objects were found in the southeastern corner and distributed along the eastern side. Relatively large bronze objects such as the bronze heads, the masks, and ritual vessels, were concentrated in the central to northwestern part of the pit. Elephant tusks were placed in the centre, probably to form a dividing line. Judging from where objects were found in situ.

A similar pattern emerged in Pit 2, where three depositional layers were obvious. The bottom layer comprised a large number of small bronze ornaments and decorations for bronze spirit trees and jade ritual objects. The middle layer contained large fragments of the standing bronze figure, bronze heads with gold faces, masks, spirit trees, and other ritual decorations. The top layer was made up of sixty-seven elephant tusks that covered the bronze pieces underneath. The degree to which the Shang civilization of central China may have influenced the evolutionary process of the Sanxingdui Culture in the remote region of Sichuan is therefore the subject of intense scholarly research and discussion (Huang 2001a; Li 1997; Yu 1996; Zhou 1996). In the following chapters artifacts from the Sanxingdui site will be examined by comparing them with artifacts from the Anyang site in order to deepen our understanding of this long-lost civilization.

Based on the evidence to date, the most favoured explanation is the one proposed by the excavators—that the pits served a sacrificial function in religious ceremonies (Sichuan 1999; Song 1991; X. Chen 1997, 1999). The ritual sacrifices, taking place on altars nearby, might have related to war, climate, the harvest, or ancestor worship. A ritual performance scene seems to be depicted on one of the large jade zhong blades found in one of the pits. Two small bronze temple models and many decorative bronze architectural items found in the pits indicate that there were indeed facilities dedicated to the performance of such ritual ceremonies (see Bagley 2001 for details). But questions remain: why would people have smashed and burned the ritual items after the ceremonies? And why have only two pits been found? As we know, sacrificial pits at Anyang, containing human, animal, and object offerings, number to several tens or even hundreds. If the Sanxingdui pits were part of a general practice of sacrifice, then one would expect to find many more such pits, as at Anyang. But because only two pits that were densely packed with high-quality, high-status objects have so far been found at Sanxingdui, it is unlikely that their purpose was sacrificial (Sun 2000d; Zhang 1987).

SUMMARY

The above lengthy descriptions of the discoveries and the cultural contexts of Sanxingdui and Anyang have prepared the ground for the following discussions of material comparison. Both cities developed independently in two widely separated regions, but they were contemporaneous and both were at the same stage of cultural development—the early Bronze Age in ancient China. Cultural materials as well as the city ruins from both sites attest to the formation of a highly advanced state in both areas. While Anyang is clearly at the centre of Shang civilization, Sanxingdui represents without a doubt a previously unknown regional civilization that is just beginning to be unveiled.

One suggestion is that the objects were buried because they had lost their magical power or were somehow associated with misfortune (Lin 1987). In this scenario, the objects would have been smashed, burned, and buried by a new regime that regarded these objects as bringing bad luck. Or perhaps the city was invaded and conquered, and a foreign regime came to power (Xu 1992). In this eventualty, all the buried objects would have come from one or a few temples of a certain religion that was banned by the newcomers. But unless history repeated itself, neither of these suggestions can explain why the two pits are dated to different times.

Another suggestion, based on the existence of other hoards in the area that contained a large number of ritual jade objects, is that the pits functioned as hoards (Qian 1992). But again, if these objects were meant to be hidden in a safe storage place to protect them from some kind of disaster, then why would they have been broken in pieces? Perhaps the objects were meant to be burned in a ceremony to make them of no further use. But unless we have additional evidence regarding the manner in which the objects were buried, we cannot be certain which of these suggestions is correct. As we have seen, the Sanxingdui pits were carefully excavated and all of the objects were found in situ. It is unlikely that these objects were ever deliberately smashed or burned.

The degree to which the Shang civilization of central China may have influenced the evolutionary process of the Sanxingdui Culture in the remote region of Sichuan is therefore the subject of intense scholarly research and discussion (Huang 2001a; Li 1997; Yu 1996; Zhou 1996). In the following chapters artifacts from the Sanxingdui site will be examined by comparing them with artifacts from the Anyang site in order to deepen our understanding of this long-lost civilization.
There are two different views on defining the periods of Sanxingdui materials. The second view proposes four rather than three distinct periods (Sichuan et al. 1987a; Chen 1989). Advocates of both theories agree that Period I belongs to the Neolithic Baodun Culture. They differ in that those who support division into three periods maintain that Period III belongs to the Shi’erqiao Culture, while those who argue for four distinct periods contend that Periods II–IV all belong purely to the Sanxingdui Culture.

Using pottery typology, the cultural materials of the Sanxingdui site are divided into three periods with six phases (Sun 1993, 2000a, 2000b, 2000c). Period II, the one with the richest context, is defined as the Sanxingdui Culture. This cultural manifestation, which is sub-divided into four phases (Phases 2–5), is characterized by an array of earthenware types unique to the western Sichuan basin—small broad-based jars, ring-footed dou bowls, high-stemmed dou dishes, and ladles with bird-shaped handles. The cultural remains of Period I include none of these vessel types; rather, they display traits that allow us to assign Period I to the Baodun Culture, which has recently been recognized as a late Neolithic culture of western Sichuan (see Chapter 1). In Period III, the common Sanxingdui pottery vessels were rapidly replaced by pointed-base jars and bowls (zhan), a diagnostic feature of the Shi’erqiao Culture, which was centred at Chengdu.

The chronology based on pottery seriation points strongly to the conclusion that the Sanxingdui Culture evolved directly from local Neolithic settlements—that the Bronze-Age walled urban centre arose as a result of increased population and technological innovation. Further, it points to the conclusion that the Sanxingdui Culture passed through four different developmental stages, reaching its climax in Phase 5, when it produced the magnificent bronze materials that were deposited in the two sacrificial pits. Although the range of pottery vessel types from the pits is limited, the large number of pointed-base bowls suggests that the pits were filled primarily with these artifacts.

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close to the end of the Sanxingdui Culture, about 1250 BC. This dating has been confirmed by comparing the motifs found on Sanxingdui bronze ritual vessels with those of Anyang’s Yin Period II bronzes. Finally, the predominance of pointed-base pottery types in both Sanxingdui Period III and the Shi’enqiao Culture is direct evidence that Sanxingdui Culture was immediately succeeded by Shi’enqiao Culture. With the rise of the Shi’enqiao Culture at Chengdu, the urban centre at Sanxingdui was gradually abandoned, and about 3000 years ago Chengdu became the major settlement centre in western Sichuan.  

Radiocarbon dating attests to the following correlation between the pottery assemblages of Sanxingdui and those of central China (Sun 2000c). Sanxingdui Period I (the Baodun Culture) corresponds in time to the Late Longshan and Early Erlitou in Central China (c. 2800–1800 BC). The four stages of Sanxingdui Period II (the Sanxingdui Culture) are roughly contemporary with the time extending from the Erlitou, through the Early and Middle Shang, to the first half of Late Shang (Yinxu Periods I–II, c. 1800–1250 BC). Sanxingdui Period III (the early Shi’enqiao Culture) is parallel to the second half of Late Shang, Yinxu Periods III–IV (c. 1250–1050 BC). 

Although the technology of earthenware production was quite similar at Sanxingdui and Anyang, the pottery wares produced show sharp morphological differences. The shapes common at Anyang, such as li tripod, small-mouthed jars, zhi, gai and lei containers, are not found in Sanxingdui pottery assemblages, and neither are characteristic Sanxingdui shapes found at Anyang. As to decoration, most Sanxingdui vessels have plain surfaces, whereas Anyang pottery is often decorated with cord-markings or with motifs commonly seen on bronze vessels. There are, however, two vessel types found at Sanxingdui—the li tripod and the high-stemmed lou dish (Cat. nos. 1–2)—that are very similar to vessels from the Erlitou site of Yanshi. This similarity has been cited as indisputable evidence for pre-Shang contact between western Sichuan and central China (Zhou 1996; see also Li 1993). 

At Sanxingdui almost all pottery was made for daily use, but the potters of Anyang produced ceramics for a variety of functions and purposes. Although the bulk of the pottery recovered from residential and burial sites at Anyang was made for domestic use, some was manufactured for special purposes. Funerary wares known as mingqi, for instance, were made in imitation of ritual bronzes (Cat. nos. 8–10) and were used in place of, or in addition to, actual bronzes in burials of lower-status individuals. Other specialty pottery items produced at Anyang were animal sculptures, architectural components such as tiles and drainage pipes, and, most notably, a great number of pottery molds used for casting bronze. 

In addition to ordinary earthenware, the pottery assemblages of Anyang include three ceramic types that do not appear at Sanxingdui: white ware, hard-earthenware, and glazed ware. These three wares are technologically more advanced than ordinary earthenware; they require clays of a particular mineral composition and they must be fired at higher temperatures. The very distinctive white ware, for example, was made from kaolin, a type of clay with very high alumina (Al₂O₃) content, which retains its whiteness when fired (Cat. no. 11). Similarly, a high firing temperature was essential to the production of hard-earthenware, a thin-bodied ware stamped with simple line or geometric patterning.  

Glazed ware, also known as proto-stoneware, was the most technologically sophisticated and advanced pottery produced at the time, and has been recovered only from Anyang Yin Period IV habitation sites and burials (Zhongguo 1994:240). Glazed ware requires careful preparation and good control of the firing temperature, which must be around 1200°C. Given the fact that the forms and manufacturing processes of glazed wares are similar to those of hard-earthenware, the later appearance of glazed ware implies that it may have evolved directly from hard-earthenware.  

Most examples of these three special Anyang wares were excavated from royal or noble tombs. This, coupled with their scarcity and fine workmanship, suggests that they were made expressly for ceremonial purposes. In contrast, none of pottery at Sanxingdui was made exclusively for ceremonial activities. Among the huge quantities of bronze and jade ritual offerings found in the sacrificial pits, there were only thirty-nine pottery items, and it can be assumed that they were put to use during ceremonies, but they are indistinguishable from the ordinary pottery found at the habitation sites of Sanxingdui. 

3. Only a small quantity of hard-earthenware was found at Anyang, whereas this kind of ware is prevalent in south China, leading some to suggest that the Anyang hard-earthenwares were imported from south China. Others, however, suggest that the wares were produced locally but that the technology for doing so was imported from the south (An 1960, 1981, 1989; Zhongguo 1994:240). 

4. Most archaeologists are in favour of local production of glazed ware at Anyang, but the possibility that it could have been imported from the south also exists (Zhongguo 1994:240).
1 Tripod He Vessel  
Earthenware  
Height 34.1 cm, max. width 2 cm  
c. 1600–1300 BC  
Sanxingdui site, Sichuan province  
The Sanxingdui Museum

This be tripod vessel of fine grey clay is almost complete. It has a tubular spout angling up from a half-closed mouth, a cover with a mushroom-like knob, and a cylindrical body supported on three large bag-like legs with pointed tips. The long, thin strap handle arches from the mouth rim to the top of one leg. Two fine thin incised lines encircle the lower part of the body where the legs are joined. This be tripod vessel was recovered from layer 8B of the 1986 excavation units; it is dated to Phase 4 of Sanxingdui Period II on the basis of its typological features.

The be tripod vessel is one of most common pottery wares found at Sanxingdui. It first appeared at the beginning of Sanxingdui Period II (Phase 2), and continued in use in Period III. Variations of this vessel type are found at contemporary sites in Sichuan and western Hubei provinces, including Shi’erqiao, Xinfan-Shuiguanyin, Yidu-Maoxitao, and Yidu-Xiangjiatuo. It has been suggested that the be tripods of the Sichuan basin evolved under the direct influence of the Erlitou Culture in central China, which had bronze be vessels of identical form and design (Zhou 1996; Sun 1993); they were among the few bronzes found at Erlitou.

The antecedent of the Erlitou was thought to be the bag-legged gui tripods of the late Neolithic Dawenkou Culture from Shandong province farther to the east. The gui and be tripods of the later Neolithic and the early Erlitou Culture were short, round-bodied vessels with open mouths. By the later stage of the Erlitou Culture, the be tripod was more elongated with an enclosed mouth, and an upward-pointing tubular spout (Zhongguo 1979). At Erlitou the be tripods were used in ritual. Use of this vessel form decreased rapidly in central China as the Erlitou Culture neared its end, and it is unknown at Anyang. The form did, however, travel westward to Sichuan via Hubei in about the nineteenth or eighteenth century BC, where it continued in use in the Sanxingdui Culture, but apparently without a ritual function (Sun 1989).

2 High-stemmed Dou Dish  
Earthenware  
Height 46 cm, max. diameter 17.98 cm  
c. 1800–1300 BC  
Sanxingdui site, Sichuan province  
The Sanxingdui Museum

The dou was a common type of food vessel that first came into use in China during the Neolithic. It is a bowl or dish set originally upon a ring-foot that evolved over time into a stemmed base. High-stemmed dou dishes are well represented in Sanxingdui pottery assemblages, while ring-footed dou bowls are less common. The stem of a dou dish was coiled by hand and then attached to a wheel-made base and bowl or dish. Large numbers of stem fragments were recovered from Sanxingdui; this is one of only four high-stemmed dou dishes found nearly intact during the 1980 excavation.

This dou dish is the largest and most complete one of its kind from Sanxingdui. It has a slender, hollow stem, 35 cm long, which flares out at the base. There are two small holes of unknown function near the top of the stem. The dish, made separately and then attached to the stem, is shallow and broad with sides that flare outwards. Made of dark grey clay, the plain surface of the dou was polished and has little decoration, a characteristic of most dou vessels. One fine raised line encircles the sides of the dish, while two more appear at the juncture of the stem and the base. A remarkable feature of this particular dou is the small engraved design on the base, interpreted by some as an eye, which was a characteristic feature of Sanxingdui bronze sculptures (Qu et al. 1993:179–80; Zhao 1997). Only one other high-stemmed dou dish from the 1980 excavation bears the same motif; it was published in Kaogu Xuebao (Acta Archaeologic Sinica) in 1987 (Sichuan et al. 1987a).

Dou vessels from Sanxingdui and those from the Erlitou Culture of central China share the same general characteristics, but similar dou have also been found at archaeological sites in the Middle Changjiang (Yangtze) River region. It is worth noting that the number of high-stemmed dou decreased rapidly at the end of the Sanxingdui Culture; they remained in continuous use, but in reduced numbers, during Sanxingdui Period III, and disappeared altogether about the beginning of
Ladles with long bird-head handles are characteristic of the Bronze-Age culture of Sichuan. They first appear in Sanxingdui Period II, and continue into the Shi’erqiao Culture. Parts of several dozen such ladles were recovered from Sanxingdui, but for some reason, none was found intact—only the handle portions have survived. Reconstruction suggests that the bowl portion of the ladle was round.

Ladles were made of fine-grained clay, which was either polished or treated with a coloured coating. The handles were modelled in the shape of an elongated bird’s neck, with the bird’s head at the end of the handle (Fig. 6). The eyes and beak were carefully depicted. On the basis of the shape of the beak and the decoration of the head, archaeologists have classified the bird-head ladle handles into three main groups: the straight and elongated “duck beak,” the short, rounded, and slightly hooked “goose beak,” and the sharply hooked “eagle beak,” dating respectively from early to later (Sun 1993). The earliest, “duck-beak” handles had no decoration at all. On the intermediate “goose-beak” handles minimal decoration suggests a bird’s comb. More complicated cloud and thunder motifs typical of bronze decoration are usually seen on the latest “eagle-beak” handles. The bird-head ladle handle in this exhibition is transitional between the “goose-beak” and “eagle-beak” forms. The bird’s eyes were nicely and explicitly depicted in relief, and a band of incised cross-hatching on the top of the head indicates the comb.

So far, only three ladle handles of this type have been found outside Sichuan. Two were excavated from the Zhongbaodao site and one was a surface find from the Lujiahe site, both in western Hubei. All three are of the earliest “duck-beak” type. The relationship between the bird-head ladles of Sichuan and those of Hubei is unclear, but some believe that the cultural influence of Sanxingdui must have extended eastward along the Changjiang (Yangtze) River, the path that served ultimately to link Sichuan and central China (see Sun 2000a). The symbolic meaning of the bird’s head as it is used on these ladle handles attracts scholarly speculation. Some believe that it relates to bird themes on bronze and gold (Sun 2000f). According to legend, Duyu, a king of the Shu state, was deified as a sacred bird; bird symbolism would therefore likely have been popular at the time. This interpretation suggests a connection between the Sanxingdui Culture and the legendary kingdom of Shu. Since it is impossible to test this theory archaeologically, however, the meaning of bird symbolism at Sanxingdui is an open question.
Zun-Shaped Vessel
Earthenware
Height 63.2 cm, diameter of mouth 33.5 cm
c. 1600–1300 BC
Sanxingdui site, Sichuan province
The Sanxingdui Museum

This vessel form is unique to Sanxingdui, and its function is uncertain. It is very rarely encountered at the site, and the vessel included in this exhibition is the only complete example excavated to date. The “zun-shaped vessel” is so named because its broadly spreading mouth, which constitutes the upper half of the vessel, is very similar in form to that of a bronze zun vessel. Some archaeologists, however, see it as a variation of the hu vessel—a water container.

The vessel on display has two equal parts: a tall neck that flares out to a wide mouth, and a belly that tapers sharply to a small, flat base. The maximum diameters of the mouth-rim and the shoulder are roughly equal, and much larger than that of the base, which is impractically small. No decoration is applied. The date for production of this particular vessel is placed in Phase 4 of Sanxingdui Culture, approximately the middle of the second millennium BC. The container is assumed to have been functional only when placed in an appropriate stand; such stands are frequently found at Sanxingdui, in contrast to the vessels, and so may have been made for some other purpose.
This vessel is another type unique to Sanxingdui. Excavated during the 1986 field season, it is one of three nearly complete examples from the Sanxingdui assemblages. Like the zun-shaped vessel, mystery surrounds both its form and its function. Because of its distinctive tripod shape with three hollow legs, very similar to that of a li tripod (see Cat. no. 7), some archaeologists have given the name “li-shaped vessel” to containers of this type. The excavators noticed traces of charcoal and evidence of burning on the vessel’s underside where the legs join the body, and surmised that it must have been used for cooking, with the hollow legs serving as the container and a dish element added to the neck below the everted mouth-rim. Others believe that this vessel is not complete in itself, that it is only the lower component of a yan-steamer, whose dish-shaped flange served to support the upper element of the steamer.

This type of tripod cooking vessel appeared first in Phase 3 and continued in use to the end of Phase 5, but disappeared with the demise of the Sanxingdui Culture. The ping bottle (Cat. no. 4), the “zun-shaped vessel” (Cat. no. 5), and the tripod cooking vessel are all vessel types unique to Sanxingdui; they show no influence from central China and therefore suggest the existence of a distinctive local tradition.

The li tripod was the most common cooking vessel type used in the late Neolithic and early Bronze Age settlements of northern China; none have been found in Sichuan. The li is dominant in Anyang pottery assemblages and shows great variety over time. Most li were recovered from residential sites near Xiaotun and Miaopu, but some were placed in burials as funerary goods. Most li, regardless of type, were made from fine sand-tempered clay and are brownish grey in colour. All li have three hollow legs, a rounded body, a large mouth, and a distinctive cord-marked surface. They were made in molds but the mouth and neck portions were finely finished on the wheel, and the solid “feet” were kneaded and formed by hand and then attached to the legs. Over the duration of the Anyang period, li became smaller, with shallower bodies and less defined legs (Zhongguo 1994:28–37).

This particular li tripod was collected from Xiaotun during the 1920s. The three hollow mammiform legs each narrow to a solid pointed tip, 2 cm high. The deep round body has a smoothly inclined neck with three encircling lines produced during the wheel-finishing process. The mouth-rim flares to a diameter almost as great as that of the body; the lip is faceted. The exterior is covered with cord-markings, which run vertically on the upper regions and horizontally below.

Typologically, this vessel conforms nearly to a type belonging to Anyang Period I. A very similar example is classified as a Type X  li vessel from the Miaopu assemblage (Zhongguo 1987:216–17). It has also been suggested that certain features of this li type can be traced back to pre-dynastic Shang cultures of about the eighteenth century BC. Quite a
large number of vessels almost identical to the ROM’s li were recovered from the Songyao site of the Huiwei Culture, about 75 km southwest of Anyang (Beijing 1996; L. D. Zhang 1996). The similarities suggest that the ROM vessel might be a Songyao Group 4 li (L. D. Zhang, personal communication). If this vessel was indeed found in situ at Anyang, it provides evidence of settlement at Anyang before it became the Shang capital. It is more likely, however, that the vessel was originally collected from the area southwest of Anyang.

Jue Wine Vessel
Earthenware
Height 19.4 cm, max. length 16.4 cm
Shang dynasty, c. 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 933.24.36
The Bishop William C. White Collection
Published: Proctor 1979:85.

Wine vessels known as jue were commonly made of pottery during the Erlitou Culture but by the beginning of the second millennium BC bronze was used for jue vessels. The pottery jue remained in use throughout Shang but only as a ritual substitute for its bronze counterpart. The bronze-imitating pottery jue wares were therefore very rare at Anyang, and all have been recovered from burials; normally, only one such jue would be buried in association with bronze and other pottery burial goods similarly made in imitation of bronze.

In general, unlike other daily-use pottery, bronze-imitating pottery wares at Anyang did not display temporal typological features that would allow archaeologists to date according to stylistic characteristics. This jue is a perfect copy of a common Shang design. Its shape differs in many ways from its antecedent, the earthenware jue of the Erlitou Culture. The vessel has an ovoid body with rounded base; a flaring mouth swept up into a long, pointed tail opposite a rising pouring trough of U-shaped cross-section; and two vertical posts with conical caps at the junction of the tail and the trough. The three long, splayed legs are triangular in cross-section; two are positioned directly below the posts and the third is beneath the centre-line of the tail. A small semi-circular handle of square cross-section and plain surface was positioned vertically along one post-leg axis. The exterior is plain except for one incised line that encircles the upper body just below the tail. Reportedly collected from Xiaotun in the 1930s, this jue was made of fine dark grey earthenware with a white coating underlying red pigment.
A typological study of miniature gu and jue that four periods, representing four different regimes, were defined for Anyang cultural materials.

These two vessels may not form a true pair in that they may not have come from the same burial. The particular characteristics of the vessel forms, however, indicate a date of Anyang Period II for both vessels.

White ware is the most distinctive ceramic ware from Anyang. Originating in the later Neolithic (the Dawenkou and Longshan cultures), the technique reached its apogee in the later part of the Anyang period, when the amount of white ware produced increased dramatically (Gu 1993). White wares were used exclusively by the ruling classes, and with few exceptions have been recovered only from royal and noble tombs (Zhongguo 1994). Excavations in the 1930s yielded more than a dozen complete white-ware vessels and 663 fragments from the Xibeigang royal tombs and the Xiaotun noble tombs. More recently, there have been two major discoveries of white ware: in 1978, about 820 fragments were recovered from 78AHM1, a large royal tomb with two ramps, and in 1984 about 90 pieces were found in 84AWBM260, a royal tomb with a single ramp (Zhongguo 1994:228–36). There have also been a number of more minor finds from other tombs.

Unlike common grey earthenware and hard-earthenware, white ware was finely and carefully made. Vessels were probably hand-coiled with wheel-finished mouth-rims and feet. The interior surfaces of the vessels were smoothed and polished, while the exteriors were extensively and carefully decorated. The elegant decoration was plotted in sections with lightly incised lines, prior to carving, to provide reliable evidence for dating commoners' burials, which would otherwise be difficult to date because they lack distinctive bronze vessels. Indeed, it was mostly on basis of the distinctive ceramic styles of the vessel forms that periods could be distinguished.
The vessels occur in a variety of shapes, but most were made in imitation of bronze forms—ding, gui, lei, fu, jia, zhi, and jue. Not surprisingly then, many of the motifs were drawn from the decorative vocabulary of bronze, including the *taotie* animal-face mask, dragon, snake, cicada, cloud, thunder, and thunder with triangle. Overall geometric decoration was also common and distinctive (Fig. 7).

The ROM white-ware fragments were reportedly collected from Xiaotun in the 1930s. There is not a single complete piece in the collection. One large fragment (g, 960.238.514) is a piece of the upper part of a *dou* dish—the most common form of white ware, and includes part of the side wall, the flattened inverted rim, and the bottom of the dish (see Fig. 7.4). The external design shows a band of sections of zigzag thunder motifs bordered by double incised lines. Another example is an ear or lug and a small section of body wall from a *lei* jar (e, 960.238.36; Fig. 7.1). The lug takes the form of a typical *taotie* animal mask depicted in full relief with a pair of C-shaped horns projecting vertically above the angled, flat top of the head. Facial features, including eyes with bulging pupils, a softly modelled nose, and cheeks, are boldly detailed in incised lines. Another fragment (c, 935.60.1; Fig. 7.3), part of an everted, flattened mouth-rim, shows two bands of decorative motifs separated by two horizontal grooves or incised lines. The upper band motifs are stylized cicadas while the lower band shows stylized dragons on a ground of hooks and spirals rendered in fine lines.

The decoration of white ware became more complex in the later periods at Anyang, but then the ware suddenly disappeared, probably because of a preference for glazed wares, which arose at the end of the Shang dynasty.

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**Fig. 7. Anyang White-ware: 1 and 2, *lei* jar, collected; 3, *bu* vessel, recovered from royal tomb HPKM1001; 4, *dou* dish, collected (after Zhongguo 1994).**
Fig. 8. Pottery bujar recovered from the Miaopu site at Anyang, PNIIIT8(3) (after Zhongguo 1994).

The ROM bujar (previously labelled as pou jar), reportedly collected from Xiaotun by the Reverend James Menzies, is a good example of Anyang hard-earthenware with traces of glazing. Made by hand with wheel-finished neck and applied foot, the bu jar is characterized by a wide mouth with straight collar neck and squared rim, a large, rounded body with maximum diameter near the midpoint, and a high, spreading foot with rounded base. The exterior is plain except for two pairs of incised lines that encircle the body just below the sharp angle into the shoulder and serve to connect two sets of paired horizontal strap handles. Below each set of handles a hole was pierced through the foot just below the junction with the body. Walls of extreme thinness and impressions made with matting or coarse textile on the rounded base are two common features of the hard-earthenware found at Anyang. The mottled surface of the jar is the outcome of an uneven burn that resulted in a dark brown glazed surface on one side and some greenish areas with less glaze on the other. The glaze was not deliberately applied, but probably resulted inadvertently when ash fell on the hot clay of the body during firing. The accidental production of a pleasant shiny surface may well have provided the necessary impetus for the development of true glaze.

Hard-earthenware was rare at the Anyang site and the technique was probably imported from the south (see Liu and Chen 2002). The ware types were limited to bu and guan jars, dou dishes, and lids (Zhongguo 1994:237–40). While the large number of bu fragments found suggests that this shape was the most common, only four complete hard-earthenware bu jars were recovered archaeologically from Anyang, two from burial M229 at Wuguan village and one from habitation deposits at Miaopu village. The fourth was recovered from the royal tomb HPKM1380 in the 1930s. All of these bu jars strongly resemble the ROM bu jar (Fig. 8); however, on the excavated pots the band within the pairs of incised lines is filled with fingernail impressions, whereas on the ROM bu the band was left plain.
For more than a thousand years exquisite bronzes collected from Anyang have been famed for their sophisticated forms and delicate designs, and sought after by connoisseurs, collectors, and scholars. Many of these masterpieces are now housed in Western museums, including the ROM. Since 1928, archaeological investigations at Anyang have scientifically unearthed thousands of bronzes that clearly attest to the highest achievement of bronze manufacture in ancient China. Today, almost every new discovery at Anyang adds to our knowledge of Shang civilization, which is largely based on its bronze technology and artworks. The diversity and complexity of the rich context of bronzes from Anyang allows scholars to trace the chronological development of bronze craftsmanship and to explore archaeological implications in reconstructing Shang societies.

Hundreds of impressive bronze objects were unearthed at Sanxingdui, all coming from three locations at the site: three plaques from the Cangbaobao location (Sichuan and Guanghan 1998), 178 bronzes from Pit 1, and 735 bronzes from Pit 2 (Sichuan 1999). Although the Sanxingdui finds do not compare in terms of quantity and variety with the Anyang materials, their discovery caused a sensation not only because of their antiquity and magnificence, but also because these sophisticated, finely crafted bronze sculptures emerged in a relatively isolated region where bronze manufacturing was previously unsuspected. The Sanxingdui finds are altering the traditional notions of Chinese Bronze Age culture, which is now no longer rooted in Anyang alone.

The first striking contrast between the Sanxingdui and Anyang bronzes is the variety of materials found at each site. The Sanxingdui assemblage is dominated by large bronze sculptures of human figures, as well as heads, masks, and decorative ornaments of animals and plants. At Anyang, weapons and vessels account for the majority of bronzes recovered. Anyang also produced a wide range of bronze objects for both daily use and ritual application, while bronzes from the two Sanxingdui pits seem to be related only to local religious practices. The forms of Sanxingdui bronzes (except for a few vessels) have very few parallels at Anyang, convincing evidence of local production at Sanxingdui. Even the ritual vessels (Bagley 2001, cat. nos. 44–49), which are the only objects for which an Anyang connection has been suggested, were produced locally: their decorative elements include *taotie* animal-face motifs, which have no echo or precedent in the Central Plain.

Perhaps the most significant aspect of the Anyang bronzes is that they were funerary goods, important components of complex and regulated burial rituals. Vessel types that were originally made of ceramic for everyday utilitarian
purposes were made of bronze and mostly for ceremonial or ritual purposes during the Anyang period. The forms and styles of wine vessels, food containers, cooking vessels, and water containers changed greatly over the nearly three hundred years of the Shang occupation of Anyang. Dating the bronze vessels based on analysis of their decorative motifs would help to date the burials with which these objects are associated. Thus, periodization of Anyang vessels has always been of the greatest interest to archaeologists (see Zhu 1999; Zheng and Chen 1985; Yang and Yang 1985). There is no consensus among archaeologists on the temporal division for Anyang bronzes; some scholars advocate three phases of bronze development at Anyang, while others insist on four phases, although the latter theory tends to be more prevalent (Zhongguo 1994:255–321; Zhu 1995:622–42). It is generally agreed, however, that the early bronzes of Anyang differed significantly from the later bronzes in their ritual application.

Anyang bronzes have captivated the imaginations of art historians around the world, and it is no exaggeration to say that each and every ritual bronze vessel recovered from Anyang is a finely crafted, glorious work of art. Archaeologists, however, look at bronzes from a different point of view (Zhongguo 1985; Yin 1997). They are more concerned with bronzes in their original configurations or settings in their primary context as funerary goods, and with what they can tell us about the class structure of Anyang society (Liu 1995). Wine vessels, gu and jue, appeared consistently as a pair in almost all burials that contained bronze funerary goods. The more pairs of gu and jue, the larger the burial, and the higher the status of the tomb owner (Zhu 1995:643). Typical small burials (4 m² average area) in Anyang, probably belonging to commoners, had only one pair and sometimes no other bronze goods. Moderate-sized noble tombs (5–10 m²) had from two to five pairs of gu and jue, along with other bronze vessels, such as ding, zun, lei, and yi, which signified the owner's status. In large noble and royal tombs, there were usually more than five pairs of gu and jue, and a greater quantity of exotic bronze vessels. Importantly, large bronze vessels and square-bodied vessels are found only in large tombs. For example, in the Fu Hse tomb (Xiaotun M5) there were about fifty pairs of gu and jue (or jue) as well as large square-bodied vessels and many other magnificent bronzes. The gu food container was a notable inclusion in moderate-sized and large tombs beginning in Phase 2 (of the four-phase development), and became an important component of bronze funerary settings commonly seen in burials of Phases 3 and 4. The gu was coupled with the ding tripod around the end of Phase 4, replacing the gu-jue configuration as a status symbol, and persisting through the Zhou dynasties as a common feature of burial ritual.

At Sanxingdui, only zun and lei have been identified as ritual vessels, and there is no evidence so far that they were associated with social status. This practice continued into later time periods (Zhou dynasties), showing no influence from Anyang burial rituals. Why the burial traditions of the Central Plain were not introduced to western Sichuan along with other dramatic cultural exchanges that took place between the two areas since early times is a question worth exploring (see Chapter 3).

Obscure and abstract decorative motifs add to the complexity of Anyang bronzes, while the mysterious facial features and expressions on Sanxingdui bronze masks and figurines are seemingly incomprehensible. Anyang bronze motifs echoed Shang artists' beliefs and views of their world and the afterlife. The imaginary tantie animal design that appeared on most Anyang vessels is characteristic of Shang art forms. Other motifs include zoomorphic designs such as abstract dragons, phoenixes, birds, snakes, fishes, tigers, and many unidentifiable creatures, as well as geometric forms such as spirals, lines, triangles, and lozenges. Some vessels display a combination of designs in multi-level reliefs that give them an elegant finish and individual character.

It appears that bird and elephant designs on Anyang bronzes could have a remote connection to those on Sanxingdui objects, but the contrasts are obvious. We know that Sanxingdui people regarded birds as sacred—birds appeared on the most sacred objects, such as the large bronze tree and the gold sheath (Bagley 2001, fig. 5, cat. no. 1), and the figurine of a hybrid human-bird creature. Birds were the most common decorative subjects of Sanxingdui bronzes, and were applied to various objects associated with sacrifice. The ancestral god of the Sanxingdui people was apparently represented by a bird (Sun 2000). In contrast, the bird design in Anyang motifs had no religious significance whatsoever; it first appeared on Middle Shang vessels, but similar designs on jade can be traced back to the Liangzhu Culture of Neolithic time. Bird designs emerged gradually but became quite common during the Anyang period of occupation, although only as a supplementary element. Early bird designs at Anyang were used to fill the gaps between decorative motifs near the shoulder or on the neck of vessels. Not until the Western Zhou did bird motifs become primary design elements, and then they dominated motif themes throughout the first half of the first millennium BC in the Central Plain. Bird images applied to the bronze fabrication of Sanxingdui, then, had very different thematic meanings from those on Anyang bronzes, appearing to have symbolic significance rather than being merely decorative.

Although so far no elephant designs have been found on Sanxingdui bronzes, it seems that elephants had a special significance at Sanxingdui. A large number of elephant tasks were interred with sacred bronzes in both sacrificial pits as well as in ordinary burials (Sichuan 1999). An elephant task may have served as a token of authority to be held by the “standing man” of Sanxingdui, but the recent discovery of many elephant tasks found in clusters at the Jinping site indicates that they likely served a ritual ceremonial purpose. Elephants as design
elements of bronze motifs appeared in the later Shang at Anyang. Seemingly, sizeable elephant herds lived in the area around Anyang; although that may seem unlikely today, the climate was much warmer and moister three thousand years ago (Zhu 1999:115–23). Oracle-bone records of elephant hunting are supported by discoveries of two elephant burials at Anyang. One pit contained an adult elephant and a sacrificed human, and the other held an infant elephant and a sacrificed pig. It has been suggested that elephants were probably trained to serve humans and also that they were used as sacrificial offerings (Xu 1930; Wang and Yang 1982).

Numerous ivory and elephant-bone carvings have been recovered; especially notable among them are three elegant ivory cups from the Fu Hao tomb (Zhongguo 1980). One Late Shang tsu vessel in the shape of an elephant was unearthed from Linlin in Henan province; two similar vessels are in Western museums, but their provenances are uncertain. Vessels with elephant designs, although rare, are the most elegant and regal looking, for example, a pair of tsu vessels from the Guangjuhuang M160 (Fig. 9; Zhongguo 1999a:66–67).

The disappearance of elephant designs from the bronze decorative repertoire about the middle of the Western Zhou is likely attributable to the vanishing of elephant populations from the Central Plain as a result of climate changes. It must be noted that, although the difference in the use of motifs between Anyang and Sanxingdui is obvious, a few design characters were common to both regions. For instance, the *taotie* animal faces on Sanxingdui bronze vessels were considered a central China influence. Another example is the pattern of angular meanders on a ground of fine spirals seen on the skirt of a Sanxingdui bronze of a hybrid human figure (Bagley 2001, cat. no. 36). This pattern is unique in the Sanxingdui bronze assemblage, but frequently seen on Anyang vessels. A *ding* vessel in the ROM’s collections (Cat. no. 14) is a good example, showing the exact pattern. This connection indicates clearly that Anyang had an impact on Sanxingdui bronze manufacture. The contrast between Sanxingdui and Anyang in the use of bronze as ritual offerings is perhaps best illustrated by considering an entire ritual bronze burial setting from each site.

**BRONZES FROM SACRIFICIAL PIT 2, SANXINGDUI**

Pit 2 at Sanxingdui was a small earthen pit that yielded 1300 offering objects, consisting of 733 bronzes, 63 gold items, 486 jades, and 18 pieces of stoneware. In addition there were 67 elephant tusks and about 4600 cowry shells.

The bronzes fall loosely into six categories: human figurines, masks, ritual objects, models, geometric attachments (possibly for architecture), and decorative hangings and ornaments. The human figurines consist of the famous life-size “standing man” thought to be possibly a priest or king, a small standing human figure (although incomplete), three kneeling human figures, one hybrid figure of a human head on a bird’s body, and, most intriguing, forty-four human heads. Four of the bronze heads have gold-foil face masks, and two gold-foil masks were found separately in the pit. All the heads and figures have a similar facial expression—oddly creased eyeballs, oversized ears, and straight mouth-line—but there are variations in cranium shapes (domed or flat) and hairstyles. While the “standing man” figure may represent a religious leader who directed ceremonies or a king who was worshipped, the heads are thought to be an assembly of religious leaders, such as shamans (Sun 2000f).
The bronze masks include twenty human masks, three humanoid masks, and nine beast masks. The human masks have facial features similar to those seen on the human figurines and heads, with some variation. The most intriguing of the masks are three oversized humanoid masks with protruding telescope-like pupils, huge fantastic ears, and a periscope-like trunk above the nose. These very distinctive masks have been suggested by some to represent gods worshipped by the Sanxingdui people (Sun 2000). The beast masks are flat (whereas all the human and humanoid masks are curved to the shape of a face) and represent an unknown animal-like creature, perhaps mythical or imaginary, with some similarity to the taotie motif of Anyang. It is possible that the masks were attached to wooden sculptures, whereas the bronze heads may have been mounted on wooden posts, but all such wooden materials would have disappeared, whether by burning or natural decay. The masks, the heads, and the figurines were likely associated with temples of local religions in ancient Sichuan (Qiu 2001).

The various ritual objects were probably used in ceremonial activities performed in such temples. Ritual bronze artifacts include 16 vessels (9 zun, 6 lei, and 1 hu), 38 jade-imitating yuan disks, 29 jade-imitating square bi objects, and 17 ge daggers. Some zun and lei vessels contained a large number of cowry shells, while other zun vessels held ritual jades such as bi, huan, and yuan disks. The manner in which these object-filled vessels were offered as tributes to gods or ancestors is depicted by a kneeling woman carrying a zun on top of her head (Bagley 2001, cat. no. 43). The jade-imitating bronze objects, bi and yuan, not seen at Anyang, may be ceremonial, but their exact function is unknown. The ge daggers were decorative rather than functional weapons, of no real use in battle, and are thus regarded as ritual objects rather than weapons. Given their small size (about 15 cm long), they might have been intended to be held by the sculptural figures in the temples.

All models of bronze trees, altars, and temples, which were found only in Pit 2, were severely damaged, so that some parts and decorative components of these objects were difficult to restore. According to the sizes of the tree bases, two large trees and four smaller trees were identified; only one tall bronze tree, 4 m high, was able to be completely reconstructed (Bagley 2001, cat. nos. 61–65). Trees were made with only a few tubular branches to which separately cast bronze birds were attached and from which bronze fruits and flowers were suspended. Two such fruits had gold wraps. Three altar models and two temple models, although all are in fragments, vividly depict aspects of the probable original settings for certain ritual actions. Also, a small sculpture of a standing man holding a zhang blade (Bagley, 2001, cat. no. 51) clearly indicates that the jade zhang served a ceremonial function in Sanxingdui ritual.

The exact purpose of the geometric attachments is unknown, but some observations and speculations regarding their use are possible. They include more than a hundred mysterious “eye-shaped” objects and six “flaring sun-shaped” circular plaques (Bagley 2001, cat. nos. 41–42). All have holes distributed symmetrically, suggesting that they may have been attached to structures inside or outside temples. The predominant form of eye-shaped objects—diamond-shaped appliques with a central boss—was made in three variations of full, half, and quarter, all represented here. The sunburst decoration on the circular plaques might also be described as a wheel with five spokes. The sun image closely resembles images depicted on temple models, and the circular plaques may therefore have had a ritual function.

The last category of bronzes includes the many small decorative hangings and ornaments in shapes of various plants, shells, animals, and bells. Small sculptures of a variety of birds are the most distinctive; their delicate and elegant designs suggest a reverence for and an admiration of birds among the Sanxingdui people. According to the excavator’s analyses, one plausible assumption is that the objects from Pit 2 at Sanxingdui were the property of one or more temples practising a local religion centred on belief in a sun-god (Sichuan 1999). The disposal of these temple furnishings—if that is what they were—the sculptures of gods, the bronze heads perhaps representing an assembly of shamans, the ritual offerings, the ceremonial altar, tree, and temple models, and the decorative hangings and ornaments—was intentional: they were deliberately broken, burned, and buried. Whether this was a result of a sudden change in religious belief or the last step in some ceremony, or something else altogether, is the subject of academic study and debate. Whatever the case, the so-called sacrificial pits of Sanxingdui reflect local rituals that have no known parallel in any other part of China.
The Guojiazhuang M160 tomb from Anyang with ritual bronzes whereas the ritual bronze vessels were placed only on the east side. Thirty-four jades were placed inside the inner coffin between the inner coffin and the outer coffin. The weapons were more or less equally distributed all around the inner coffin, sacrifices. All the bronze ritual vessels, the tools, most of the weapons, and some small ceramic wares were found placed and some bronze dog sacrifices were identified in the tomb.

An intact set of funerary goods was neatly arranged within the pit. Sets of ceramics, stone yin musical instruments, and some bronze ge weapons were placed at the southwestern corner of the ledge, along with parts of bull and goat sacrifices. All the bronze ritual vessels, the tools, most of the weapons, and some small ceramic wares were found placed between the inner coffin and the outer coffin. The weapons were more or less equally distributed all around the inner coffin, whereas the ritual bronze vessels were placed only on the east side. Thirty-four jades were placed inside the inner coffin.

The burial goods totalled 353 objects, 291 (83 per cent) of which were bronzes. The majority of the bronzes (232 pieces) are weapons, most of which are ge daggers and maos spearheads, the two most common weapon types in Shang China. In addition, there were 906 arrowheads, in 9 bundles, all diamond-shaped in cross-section. Notably, five of the weapons—three yao-axes and two knives—are highly decorative and were therefore probably not used as weapons. Most likely, such items were status symbols associated with high-ranking Shang military officials.

Other bronze offerings include seven pieces of tools, six ornamental bells, three nao bells that functioned as a musical instrument, two other fragments of unidentified objects, and forty-one musical instruments, seven cooking vessels in two types (ding and yun), one food container (you), one water container (qin), and one square-bodied container of unknown function. This is one of most extensive and varied settings of bronze ritual burial vessels. The wine vessels include ten pairs of gu and jiao, to date the second largest number of pairs ever found in a single burial—only the Fu Hao tomb has more. These pairs are unconventional in two ways: first, jiao were used instead of jue, though the two are similar in form and function, and second, the gu were the more prestigious square-bodied type rather than the traditional round-bodied type. Six of the seven food vessels are ding tripods, including a large ding, about 55 cm high and 42.2 cm in diameter, in which were found about two dozen pieces of bone. Two of the dingos are about half the size of the large one, with a slightly different shape to the legs and body. One ding has a lid and a hoop handle, so far the only evidence of this form at Anyang. Nearly half the ritual vessels are the prestigious square-bodied type, including, in addition to the ten gu mentioned above, a pair of fang-ding, a pair of fang-zun, a pair fang-jia, and one unnamed container. The remarkable fang-zun vessels were regally decorated with zoote animal faces on body and foot and with four elegant elephant heads mounted on the shoulder corners (Fig. 9), resembling the well-known pair of fang-zun housed in the Taipei Palace Museum of Taiwan (Taiwan 1989:102, 249). The artfully decorated fang- and you vessels further distinguish this bronze setting. Instead of the usual zoote motif, the you were primarily decorated with charming elongated dragons and birds on a spiral (kuenen) background. Both fang and you have animal-head decoration on the handles.

Tomb M160 is one of the finest examples of Anyang burial practice. Clearly, the bronze setting not only reflects the social status of the tomb owner, but also shows a strict observance of a regulated burial ritual. The owner of tomb M160 might have been a high-ranking military general and/or a member of the ruling class—thirty-three of the bronze vessels bear inscriptions suggesting that they belonged to a military officer named ‘Zhi.’ The two horse-and-chariot burial pits that accompanied tomb M160 (see Chapter 6) are further evidence of the tomb owner’s high status. Analysis of the decorative styles and motifs applied to the tomb’s ritual bronzes, and typological analysis of the ritual pottery, allow us to date the tomb to the second half of Anyang (Yinxu) Period III.
were used for another purpose: as containers for small objects of offering, including jades, bronzes, cowry shells, and ivory beads. The decoration on the zun vessels from Sanxingdui is more complex than on the ROM zun and covers larger areas of the body. The masks with body extensions in the band on the foot of a Sanxingdui zun (Bagley 2001, cat. no. 44) from Pit 1 are related to the masks on the body of the ROM zun. The same is true of the eye motif found on the foot of a Sanxingdui lei vessel (Bagley 2001, cat. no. 48) from Pit 2 and the band on the shoulder of the ROM zun.

—Sara Irwin
Ding Food Vessel

Bronze
Height 33.9 cm, diameter 26.6 cm
Late Shang dynasty, c. 1300–1050 BC
Anyang, Henan province
Royal Ontario Museum, 954.136.1
The Reuben Wells Leonard Bequest Fund
Published: Ackerman 1945, pl. 15; Fernald 1955, fig. 2; Heinrich 1963:31; Todmre 1968:25; Irwin 1992:91.

This vessel, like Cat. no. 13, is part of a group purchased in 1954 from New York dealer Frank Caro. It was in C. T. Loo’s possession by at least 1945, when it appeared in a publication by Phyllis Ackerman. The invoice for this vessel sent to the ROM from Frank Caro stated that it was “found in Anyang.” Nothing further is known of its provenance or how it arrived in the West.

This is a solid well-cast vessel with handles made to simulate twisted rope, two bands of decoration, and animal masks at the top of the legs. A narrow band around the neck is filled with six pairs of profile dragons on a spiral (leiwen) ground. The body of the vessel is almost completely covered with a geometric design of interlocked Ts on a leiwen ground. A similar pattern found on a rare Sanxingdui bronze figurine is suggestive of direct borrowing from Anyang. The animal mask at the top of each leg is in low relief and split vertically by a notched flange. A black pigment, possibly an intentional inlay, fills the recessed areas, making the animal heads, dragons, and interlocking Ts stand out more clearly.

The principal designs on the majority of Late Shang vessels are based on either real or imaginary animals. The interlocking T motif is not very common, but other vessels decorated in a similar manner have been excavated in the Anyang area. The most interesting feature of the ROM ding is the stylized animal head at the top of each leg. These heads, with large inward-curving horns, may be intended to represent the heads of wild rams. A similar motif appears in various forms on a variety of bronze vessels.

—Sara Irwin
This vessel belongs to a group of vessels, weapons, horse-and-chariot fittings, miscellaneous jades, and mother-of-pearl fragments that, according to Bishop White, came from a location just east of the village of Xiaotun in Anyang. In his book *Bronze Culture of Ancient China*, White reported that in July 1933 a friend brought him four bronze vessels, two of which, a *jia* and a *gong* (see below), ended up in the ROM. This assemblage of objects was named the “Elephant Tomb” group by Bishop White, because of the elephant decoration on both the *gong* and the *you*. Whether this group actually came from one burial or a number of burials is uncertain.

The *jia* is the largest of the ten vessels in the ROM that are reported to have come from the “Elephant Tomb.” The decoration on this vessel is divided into three bands. Around the neck there is a band of triangular motifs filled with a design derived from the cicada. Here it is shown in its most abstract form (on some vessels the connection between the design and the insect is much clearer). The decoration on the body is split into two horizontal bands by a plain, narrow sunken groove, and vertically by notched flanges and the handle. Both bands are approximately the same width and the decoration is executed in a similar manner. The principal motifs are set against a background of spiral (leiwén) design. The design is worked in intaglio with only the eyes and vertical flanges in relief. In the upper register the design can be read either as three pairs of profile dragons facing each other or as three animal masks with body extensions. Behind the upward-curving tail of the main creature in each motif, there is a small dragon with its mouth open and its body bent at a forty-five-degree angle, running parallel to the notched flange. The lower band has three animal masks with detached body parts. The handle is joined to the neck and to the lower body above one leg and is surmounted by an animal head resembling that of a water buffalo. Attached to the rim are two short rectangular posts with mushroom-shaped finials.

Vessels similar to the ROM *jia* were found in the Fu Hao tomb at Anyang. The major difference is the shape of the posts and finials. The vessels from the tomb of Fu Hao generally have longer posts and spool-shaped finials, which give them a more elegant appearance.

—Sara Irwin
The major defining feature of this particular vessel type, apart from the shape, is the animal-derived decoration and the animal form of the front of the lid. Gong vessels from the Fu Hao tomb are decorated mainly with tigers and owls. On the ROM vessel, which is probably of later date, tiger and owl motifs have been relegated to a subordinate position in the decorative scheme.

—Sara Irwin

This bronze gong is part of the “Elephant Tomb” assembly (see Cat. no. 15). This type of vessel was made during the Shang dynasty and into the early part of the succeeding Western Zhou dynasty. The vessel is shaped like a sauce-boat with a lid and is decorated with a complex array of real and imaginary animals. The front of the lid is modelled to resemble the head of a Muntjac deer. Running part-way down the centre of the lid is a scored flange which splits a mask with water-buffalo horns; on the back of the lid is a tiger mask with upright ears. On the handle there is a mixture of bird and tiger elements, and a tiger head with upright ears projects from the horizontal portion of the handle, which is decorated with a feather motif. Below the tiger-head projection, the handle curves around to join the lower body of the vessel, where there is a bird-wing on either side. The body of the gong is divided into two horizontal zones by a shallow groove, and into four compartments by four vertical notched flanges. On the neck, under the spout, there is a mask with water-buffalo horns like the one in the centre of the lid, with a profile elephant to either side. Between the flanges and the handle on the neck are two conventional profile dragons. The main body is decorated with four masks with Muntjac deer horns and ears, each composed of a pair of back-to-back profile elephants. This means that the design can be read as either four masks or a frieze of eight profile elephants. A conventional band of four masks decorates the foot. The elephant motif is not commonly seen on Shang bronzes. Only one vessel with such a motif has come from a controlled excavation in the Anyang area, a fanyi with profile elephants, two on each side of the foot. Magnificent elephant-shaped vessels are of course known, but elephants as part of the decorative scheme are rare.
**Gu Wine Vessel**

**Brewing**

Height 41 cm, diameter of mouth 14.4 cm
Late Shang dynasty, c. 1300–1050 BC
Anyang, Henan province
Royal Ontario Museum, 931.12.55
The Bishop William C. White Collection
Published: White 1956:26; Poor 1988.

This *gu* is also part of the “Elephant-Tomb” collection (see Cat. no. 15) but was acquired separately from the *gong* and *jia* (Cat. nos. 15–16). Like most Late Shang *gu* vessels, this goblet has three decorative zones. On the upper part, a large trumpet mouth, is a design of four blades filled with elongated ovoid spirals rising up from a band of spirals around the base of the neck. The short tubular body is divided into four sections by raised scored vertical flanges, which continue down to the lower part of the hollow splayed foot. The body design was cast with pairs of looking-back dragons and birds. The most unusual decoration of this vessel is on the foot, which has four sections, each outlined by openwork. In each section there is a standing bird whose body and crest are filled with fine parallel and curving recessed lines; the four sections are arranged as two pairs of facing birds. The top of the foot is plain except for two “bow-string” lines and two cruciform apertures, one above the centre of each pair of birds.

A *ya-yi* symbol appears as part of the casting on the outside of the flared mouth. This inscription, probably representing a clan identity, was first used in Yinxu Period II, and continued to Period III. There are a number of vessels from Anyang with this inscription, but in many cases it is cast on the inside of a *gu* goblet. A closely related vessel in the Kyoto National Museum has very similar designs and similar openwork on the foot; the *ya-yi* symbol was found in the same position as on the ROM *gu*. The two vessels are probably from the same foundry at Anyang.
Jade use in China dates back at least 7,900 years to the oldest jades recovered from the Xingle site of Jilin province. Some jades in the Bronze Age sites show little change from the Neolithic period. Jades had two main uses: as ritual ceremonial objects, and as personal possessions, such as pendants or decorative ornaments that enhanced the social status of the owner. A conspicuous contrast is evident between Sanxingdui jades and Anyang jades, although both represent the unprecedented accomplishment of the jade industries in ancient China. Most Sanxingdui jades were made for ritual use, while those at Anyang were more likely to be made for personal enjoyment, as jewelry or decorative objects.

Sanxingdui jades were made locally. They were recovered widely across the site, unlike the Sanxingdui bronzes, which were found only in the two sacrificial pits. It was the jades that provided the first clues about this unknown culture in the later 1920s. Subsequent investigations have yielded hundreds of jades, concentrated in two broad areas: in the north central part of the urban site (Cangbaobao and Yuliangwan), and in the two sacrificial pits in the south. So far, Sanxingdui jades fall into three categories: ritual objects, tools, and ornaments. All the ornaments are beads, and most were found in bronze ritual vessels in Pit 2, suggesting their possible use as ritual offerings.

The ritual jades recovered from the Sanxingdui sacrificial pits are distinctive, consisting mainly of two types: short, broad, pointed ge blades, and elongated fork-tipped zhang blades. Both ge and zhang blades have been found at other ancient sites; however, a unique hybridized type, the fork-tipped ge blade, is known only from Sanxingdui (see Bagley 2001, cat. nos. 58–59). Thirty-four such fork-tipped ge blades were recovered from Pit 1 (which had a total of forty-eight ritual jades); there were none in Pit 2 or anywhere else on the site. Interestingly enough, all three kinds of blades found in the pits were rarely encountered in the jade hoards in the northern part of the site, where ritual bi rings in various sizes were dominant. These different distributions suggest a difference in use of ritual jades, perhaps related to social status or differing religious traditions.

Jades from Anyang are equally well crafted and refined as those from Sanxingdui, but the forms are much more diverse. At Anyang, almost all the jades were from large and moderate-sized tombs, being the personal possessions of the tomb owners. Few, if any, were found in small burials or at...
somewhat different in form from those at Sanxingdui, being predominately recovered from the Fu Hao tomb alone, and less than a quarter of these were ritual objects. Anyang ritual jades are of the jades in Anyang burials signified personal wealth; only a few had a ritual purpose. A staggering 755 pieces were part of social life. The ritual use of jade at Anyang, however, might not have been as important as at Sanxingdui. Most the administrative and ritual systems of the Zhou dynasty. It documents and regulates the use of jades as an important possession of the elite. Most pendants were lively carvings of animals and insects, all personal ornaments of the elite. Most pendants were lively carvings of auspicious animal forms (see Cat. nos. 21–28), representing at least thirty-one animals, birds, fish, and insects that once lived at Anyang (although some no longer inhabit the area because of climate changes), and including elephant, rhinoceros, buffalo, tiger, bear, horse, rabbit, dog, deer, sheep, bat, alligator, tortoise, salamander, fish, cormorant, owl, duck, cicada, silkworm, and grasshopper. The fish and bird pendants are the most vivid and show the greatest diversity of form. Imaginary creatures, such as dragon and phoenix, and abstract bird forms are also included. Although birds were important subjects of jade carvings at Anyang, representations of the birds was limited to realism, a contrast to the depictions of birds on Sanxingdui bronzes. These elegant carvings bespeak an affinity between the people of Anyang and the wild creatures that inhabited their world. Moreover, the delicate craftsmanship required to carve these jades was likely affordable only by the affluent. The Anyang jade animal plaques and figurines are presumed to have been made only in Anyang workshops, for no parallels have so far been found at Sanxingdui.

It is interesting to note that even though Anyang produced very few bronze human masks, Anyang jades include numerous human figures and masks. In addition to the more than a dozen jade carvings and sculptures of humans that have been archaeologically recovered from Anyang royal tombs, such artworks can also be seen in a number of Western museums, including the ROM (Cat. nos. 29–31). The small human sculptures are mostly of kneeling or squatting figures with their hands on their knees (Fig. 10). Unlike Sanxingdui bronze heads and masks, Anyang jade figurines show realistic facial expressions with little exaggeration. It is also clear that Anyang jade human figurines were intended not as religious symbols, but as representations of real life. The finely carved linear detail on most Anyang figurines vividly displays the hairstyles and forms of dress that prevailed during the Shang period in central China (Fig. 10). Indeed, Anyang jade and Sanxingdui bronze human figurines offer an interesting comparison of regional variation of dress during the Shang dynasty. Sanxingdui hairstyles and dress clearly indicate a local manifestation, although pigtails in the hair were found on both Anyang and Sanxingdui figurines (Huang 2001b; Song 2001:331–85). Barefoot Sanxingdui people were likely to have worn ankle and arm bracelets, a fashion still seen in present-day local populations. A long robe with elaborately decorated designs was a common formal style of the Shang people of central China (Tian 2001; see also Hsu 1996:425–29).

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The long, slender, down-curving blade has a midrib and bevelled edges on both faces. The midrib continues through the rectangular tang (which flares slightly towards the butt end), though the tang edges were bevelled separately. The blade–tang juncture is marked by symmetrical in-cutting. To either side of the blade base are four “teeth,” the middle two on each side divided by brief incised lines. There is a neat cylindrical perforation near the base of the tang on the midrib. The straight butt of the tang was bevelled to a ridge.

Notched Disk

Jade

Diameter 11 cm
Late Neolithic–Shang dynasty, 3000–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 928.12.57
The Bishop William C. White Collection

This ring-like form resembles a gear. Its outer perimeter flares out in a tangential curve and jogs back in three times, dividing it into three sections of roughly equal length. There are two small notches or dentitions in the centre of each curve. The interior circumference is an imperfect circle. Ends of dentitions were marked with double lines in fine relief. This type of notched disk is only rarely encountered at archaeological sites; one was found in the tomb of Fu Hao, and another in the recently excavated M160 noble tomb, suggesting that such disks were used or owned exclusively by aristocrats.

Ge Dagger-Axe

Jade

Length 32.6 cm, width 7.1 cm, thickness 3 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 934.17.119
The Bishop William C. White Collection

This axe is fashioned from mottled buff-coloured jade with gold and brown staining and traces of calcification. The jade was polished to a fine low lustre, but now shows incrustations of earth, red pigment, and other matter. The long, slender, down-curving blade has a midrib and bevelled edges on both faces. The midrib continues through the rectangular tang (which flares slightly towards the butt end), though the tang edges were bevelled separately. The blade–tang juncture is marked by symmetrical in-cutting. To either side of the blade base are four “teeth,” the middle two on each side divided by brief incised lines. There is a neat cylindrical perforation near the base of the tang on the midrib. The straight butt of the tang was bevelled to a ridge.

Yue Axe

Jade

Length 6.6 cm, width 5 cm, thickness 2 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 927.19.253
The Bishop William C. White Collection

Of dark green jade shading to white on one face and mottled with tan, gold, and white on the other, this axe has a fine but not sharp cutting edge. There is one relatively large (compared to that on similar Yue axes) conical perforation at the centre near the butt end. Fine lateral “flanges” consist of notched central and single outer projections carved with more flare than the fine little “teeth” on this nice, nearly square axe. Similar Yue axes were excavated from royal tombs M1001 and M1084, as well as from the tomb of Fu Hao.
21
Tortoise Pendant

Jade
Late Shang dynasty, 1300–1050 BC
Length 5.5 cm, width 3.5 cm, thickness 1.7 mm
Anyang site, Henan province
Royal Ontario Museum, 932.16.175
The Bishop William C. White Collection

The underside of this plaque-form pendant is flat and plain but polished and slightly rounded towards the edge. The head, legs, and tail of the tortoise all project beyond the plaque form. The head is pointed, with bumps for eyes and an incised neck wrinkle. The tail curves to the right. The carapace is divided into sixteen sections by somewhat roughly incised cross-crossing lines, four vertical and three horizontal. The plaque extension under the nose has a biconical perforation, angled down from either side towards the centre, for stringing. The elemental realism of the rendering and the thickness of the piece suggest an early date.

22
Tiger Plaque

Jade
Length 6.0 cm, height 2.5 cm, thickness 2.0 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 931.13.26
The Bishop William C. White Collection
Published: Dohrenwend 1971:62.

Made of mottled white jade tinged with grey at the jaw and foreleg, this thin plaque of a stalking tiger seen in profile, jaws down, legs bent forward, and back curving twice, was carved in outline. The drooping tail is broken off just at the (perforated) tip. There is a biconical perforation in the jaw and a minimum of simply incised and bevel-cut linear detail. There are traces of earth and red pigment on the reverse.

23
Cicada Sculpture

Fluorite
Length 4.3 cm, width 2.5 cm, thickness 1.7 cm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 928.12.159
The Bishop William C. White Collection
Published: Dohrenwend 1971:130.

This small cicada sculpture conceived in almost full round has a smooth finish and simplified but realistic detail. Eyes, wings, beveled body, and "legs" are in relief, while head and thorax divisions are simply incised. There are beveled sides, but no body segments indicated. The mouth in low relief on the underside shows an early concern for completeness. This is one of an interesting group of fluorite objects from Anyang, which may have served in Shang or slightly later times as jade substitutes.

24
Bird Pendant

Jade
Length 3.2 cm, width 4.9 cm, thickness 7 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 932.16.190
The Bishop William C. White Collection
Published: Dohrenwend 1971:61.

The soft grey-green jade of this pendant is lightly flecked and semi-translucent, with amber veins and patches. Seen as from above, the bird was perfunctorily carved in roughly triangular form. It has large round eyes in a small round beakcd head carved in slight relief against the flat body, which is all out-spread wings and tail. The back is flat and plain, except for incised and indented main divisions. The underside is rounded towards the edges, with legs and feet represented by divided, low-relief, rectangular "blocks." There is a biconical perforation under the beak for stringing.
25
Hare Pendant
Jade
Length 2.5 cm, height 1.5 cm, thickness 9 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 932.16.187
The Bishop William C. White Collection

This pale green transparent jade pendant shows a tiny creature that was conceived in profile but realistically carved on both sides. The contained outline tapers at the head, which is separated from the foreleg below by a biconical perforation for stringing. The silhouette was adjusted to show the ear, tail, and forward-angled legs. The slightly concave ears lie along the back. The eyes are round and there is a brief mouth-line and indication of paws. Other details are simply rendered by bevelled cuts.

26
Hare Pendant
Jade
Length 4.4 cm, height 2.1 cm, thickness 4 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 931.13.338
The Bishop William C. White Collection

This pendant is dark green jade, semi-transparent where it is thinner at the edges, and showing lighter green patches on both sides. The piece is small and thin, slightly concave on one face, and slightly convex on other. The silhouette of the animal in profile is relatively open and angular. Scored and incised details are similar on both sides: a high round eye, an ear–body dividing line, haunches, mouth, and paws. A biconical perforation through scoring of mouth and paws indicates the division between neck and foreleg. Traces of earth and red pigment remain.

27
Fish Pendant
Jade
Length 5.7 cm, height 2.2 cm, thickness 2 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 932.16.187
The Bishop William C. White Collection

This fish pendant of grey-green semi-transparent jade was carved on both sides. It retains traces of ochreous pigment. The thin fish form has a slightly upturned snout, bevelled around discoidal eyes, two rows of three scales each on the body, and three parallel lines ending in spirals on the tail. Incised striations indicate the dorsal and ventral fins. A conical perforation was drilled from one side below the eye.

28
Bird Pendant
Jade
Height 7.5 cm, width 3.4 cm, thickness 3 mm
Late Shang dynasty, 1300–1050 BC
Anyang site, Henan province
Royal Ontario Museum, 934.17.120
The Bishop William C. White Collection

Both sides of this pale green, semi-transparent jade pendant were carved with similar features. A bird of prey is indicated by the downward-angled beak and back-angled small crest or "horn." Double outlines vividly delineate the eyes, and there are four vertical bands above each wing. The angled leg has a downward extension from the claw; this was broken during or after perforating for suspension. The angular tail descends below the claw before curling back and up at the tip.
Jade

**Human Head Pendant**

Jade  
Height 3.4 cm, width 2.4 cm, thickness 8 mm  
Late Shang dynasty, 1300–1050 BC  
Anyang site, Henan province  
Royal Ontario Museum, 960.241.1  
The Dr. James M. Menzies Collection

This carved jade pendant of a head with a cap is translucent grey-green stone. The face is rather flat with only very light modelling. The back of the pendant is finished but plain. The ears are delineated in outline, and circular earrings hang from the elongated lobes. An edged, transverse element above the brow suggests the flat cap or headband. The neck is strong and undecorated. A fracture line can be seen in the plain central back-panel. A V-shaped break in the top of the head exposes the top of the perforation, which runs through the pendant from top to bottom and possibly occurred at the time of carving.

**Mask Ornament**

Jade  
Height 4.3 cm, width 3.2 cm, thickness 4.5 mm  
Late Shang dynasty, 1300–1050 BC  
Anyang site, Henan province  
Royal Ontario Museum, 992.129.1  
The Herman Herzog Levy Bequest Fund

Both front and back of this light green jade plaque were carved with the same details in low relief to show a mask with a feathered headdress. The eyelids are pulled down to an exaggerated degree over the inner corners of the eyes; the C-shaped ears are angular; the nose is broad and flat, and there is no clear mouth. The eyebrows extend and curl upwards, possibly indicating horns. A band decorated with criss-cross lines that form lozenges runs straight across the low brow. Attached to the band are two tufts of three feathers each. The feathers are upright but the tips bend outward symmetrically, and seem to curl around two biconical perforations, which probably served to suspend the mask as a pendant. Four perforations—two through the lower edge to the back of plaque, and two through the upper edge to the back—enabled the plaque to be strung within a series of beads. There is very minor white staining from burial on both faces.

**Huaxue Arc-Shaped Figural Pendant**

Jade  
Height 8.1 cm, width (arc) 3.3 cm, thickness 3 mm  
Late Shang dynasty, 1300–1050 BC  
Anyang site, Henan province  
Royal Ontario Museum, 932.16.12  
The Bishop William C. White Collection  
Published: Dohrenwend 1971:53.

This pale green translucent jade human-like figural pendant was probably recarved from a fragment of a bi-form ring. A tiny biconical perforation for hanging was made in the flange of the finely striated crest. This pendant is distinguished by the fineness of the carving, the representation of detail, especially of the ear and the back-flange, and the placement of a cross-in-circle device on the knee rather than on the rump of the figure, where it is more often found. Traces of earth and red pigment can be seen.
The earliest archaeological evidence for the use of a horse-drawn wheeled vehicle in China is wheel-impress traces of two wheels, 1.2 m apart, found in the Yishi Shang city of Henan, along with one bronze axle cap (Song 2001; Zhongguo 1998b, Du et al. 1998). There is no other substantial evidence to suggest that such early vehicles were in use in the Early Shang period. On the other hand, excavated materials point to extensive employment of chariots during the Late Shang. To date, a total of forty-one Shang horse-drawn chariots have been recovered from three archaeological sites in northern China. Only four of them were found outside Anyang: one from Laoniupo of Shaanxi and three from Qianzhangda of Shandong (Song 2001:401–4; Liu 2000; Zhongguo 1994). In addition, numerous horse-and-chariot fittings were unearthed from the Anyang site and from sixteen locations outside Anyang, all dated to the Late Shang (Song 2001:309–406). The sudden appearance of chariots in the Late Shang has been attributed to Near Eastern or Central Asian influences during the middle of the second millennium BC, but it is not yet known exactly how Western chariots were first brought to central China (Wang 1998; Cui 1988). Archaeological evidence to date suggests that neither horses nor chariots reached western Sichuan until much later. This luxurious form of transportation enjoyed by the royals and nobles of Anyang was not shared by their counterparts at Sanxingdui.

Although Shang chariots are similar in many ways to those from the Near East, some elements originated in central China, especially bronze fittings, which were decorated with the same motifs found on Anyang bronze vessels. Organic materials used to make the vehicles and harnesses (probably wood and leather, respectively) were all but completely decayed, with only traces remaining at archaeological sites. Fortunately, horse-and-chariot fittings were recovered in situ, suggesting how the chariots were configured (Yang 1984; Zheng 1987). Generally, the Shang chariot was pulled by two horses harnessed on either side of a draught-pole and joined by a yoke that was attached at right angles to the forward end of the pole. The horses were harnessed to the yoke by means of yoke saddles, which were suspended from the yoke and probably sat just above the withers of the horses. The draught-pole was about 2.6–3.0 m long and probably made of a single piece of wood, which passed under the chariot box and sat directly on top of the axle. The chariot box was usually rectangular, though some oval examples have been found. Unlike chariots from the Near East, the Shang chariot box was mounted centrally over the axle. The sides of the box were made from more than twenty evenly spaced posts or uprights connected with a few horizontal bars. Entrance to the box was from the back. The wheels had eighteen or more spokes and ranged from 125 to 150 cm in diameter.
The horse-drawn vehicles found at Anyang are sophisticated, well-designed conveyances. Over the years there has been much debate about the use of chariots in Shang society. Current evidence indicates that they were used mainly for hunting and leisure activities. Although there is little direct evidence for the use of the chariot in warfare, weapons were recovered in more than a third of the horse-and-chariot pits identified at Anyang, raising the possibility that chariots could have been used by high-ranking members of the military as command platforms. Because the Shang chariot was a rare and prestigious item, only privileged members of society would have owned one. In fact, almost all the chariots that have been recovered were found in association with large royal and noble tombs. In the succeeding Zhou dynasties, the military strength of a state was measured by the number of chariots it could deploy for battle. With the adoption of cavalry, chariots were once again used mainly for hunting and recreation as well as for ceremonial purposes, as seen on the Han dynasty stone reliefs.

A complete horse-and-chariot burial pit usually contained a chariot with two horses and one sacrificed driver: sometimes there would be a second sacrificed person, and occasionally a dog. To date, thirty-seven horse-and-chariot pits have been excavated at Anyang; sixteen of them have been identified and excavated since 1980 (Zhongguo 1994:138–47; Yang and Liu 1998). These later discoveries, concentrating on Yinxi Xidi, Guojiazhuang, north Lijuizhuang, and southwest Meiyuan, include seven pits in intact condition. Excavating techniques have improved greatly over the years, and the more recently uncovered materials have been able to shed new light on the social function of these vehicles as well as their use in burial ritual. The most well preserved horse-and-chariot pit excavated to date will be described below, following a summary of the recent evidence that has altered our previous understanding of horse-and-chariot burials in general (Yang and Liu 1998:179–80).

Horse-and-chariot pits were generally found in pairs. At Lijuizhuang, for instance, six pits were found in three pairs. The two pits in a pair, as well as the horses and chariots within, shared features of orientation, size, and fittings, and were close to each other (14–4 m apart). At southwest Guojiazhuang, two pairs of complete horse-and-chariot burial pits were found in association with two additional horse-only burial pits. One Guojiazhuang pair, M146 and M147, was located about 35 m northwest of the large noble tomb M160 mentioned in Chapter 4, and the bronze weapons found in those pits were identical in temporal style and design with those recovered from M160. Interestingly, the other Guojiazhuang pair, M52 and M58, was found in the same orientation—about 35 m northwest—to another large tomb with a ramp, M172. The excavators have reasonably suggested that all three pits were sacrificial burials associated with the tomb's occupant (Zhongguo 1998a). The earthen pit M52 is nearly square (3.5 m × 3.2 m) with a depth of 4.2 m. It contained two horses, a complete chariot, the driver, and another person, all presumably sacrificed (Fig. 11). The orientation of the horse and chariot is east–west, with the chariot box at the eastern end. The two horses lay under and on either side of the draught pole, face to face, with their heads at the position of the yoke. Underneath the horses were the remains of mats with a layer of red ochre. The driver was laid out full length behind the chariot box, completely covered in red ochre, with the head towards the south and facing east. The other human had the hands tied behind the back and was buried along the north side of the chariot, apparently wrapped with sigaig-patterned matting and a reddish textile. Both skeletons were determined to be males between twenty and thirty-five years of age.

The two wheels at each have eighteen spokes and are 1.35 m to 1.5 m in diameter; they are set 2.3 m apart. About thirteen bronze wheel-pin fittings were found near the wheels. The axle, 3.08 m long, extended about 10 cm beyond the wheels at each end, where a bronze cap (wai) was installed. The axle-cap fittings, found in situ, consisted of two parts: the rectangular cap with rounded edges, and a bronze clip (zu) topping a wooden linch-pin that went through the hole in the middle of the cap to stabilize the wheels on the axle. Charcoal was found inside the clip.

The draught-pole, roughly square in cross-section, is 2.68 m long; on the end nearest the box there is a bronze terminal (zheng), consisting of a bronze T-shaped fitting and a bronze pole-holding, which attaches under the back edge of the box. At the forward end of the pole is the 2.35-m-long bow-shaped yoke, the first and only evidence so far of a Shang-period curved yoke. There is a triangular bronze fitting attached to each end of the yoke. Two bronze yoke saddles, each including a mushroom-top cap and two linings, lay on either side of the pole. Two small bronze animal masks were found in situ on the yoke, near its junction with the pole.

All chariots found at Anyang before 1987 were equipped with a straight yoke. Curved yokes were known only from depictions in hieroglyphic images on oracle bones and bronzes, but then a chariot with a curved yoke was excavated from Guojiazhuang M52 (see below), confirming the existence of this chariot form in Shang China.

The use of a horizontal bar in front of the chariot box was previously considered to be a new invention in Western Zhou. However, such a bar was recently identified on the chariot excavated from the M48 horse-and-chariot pit at northern Lijuizhuang, implying an earlier date of invention for this chariot component.

THE GUOJIAZHUANG M52 HORSE-AND-CHARIOT PIT, ANYANG

Excavated in the fall of 1987, the M52 horse-and-chariot burial is the best preserved of such pits. It was discovered in association with another horse-and-chariot pit, M58, and a horse-only pit, M51, near a large but looted tomb, M172. The excavators have reasonably suggested that all three pits were sacrificial burials associated with the tomb's occupant (Zhongguo 1998a).
The box is roughly rectangular, about 1.45 m long by 1 m wide. There were twenty-two small upright posts (eight in front, four on each side, and six at the back), 6 cm in diameter. Entry to the box was from the rear, where an opening was left, about 41 cm wide. Near the front barrier was a strip of reddish ashen remains about 1.4 m long by 24 cm wide, along with some textile marks. Excavators believe that it was probably a wooden slab attached to the front of the box and covered with a red textile. More ashen wood remains covered with a layer of red paint and some black paint applied as lines were recovered from the floor of the box. The surface of the ash and paint layer was overlaid with the remains of zigzag-patterned mats. These remains indicate that the box floor was made of wood painted red and black and covered with mats. The same red paint was also evident on the box posts. Two rectangular bronze fittings were found inside the box, one on either side of the entrance. The fittings may be for the box but their actual function is unknown.

In summary, the complete set of bronze chariot fittings recovered from M52 includes a pair of each of axle caps (wei), axle linch-pin clips (xia), pole terminals (zhong), triangular yoke-end fittings, yoke saddles (including caps and linings), rectangular box fittings, and animal-mask yoke fittings, plus thirteen wheel-pin fittings. The horses were decorated with ten bronze bosses in various sizes (fewer than in most such burials), a bell, a shell ring, and a hundred sea-shells. The shells were arranged neatly on the horses’ heads, forming a band of varying thickness (1.6 cm–2.4 cm); similar sea-shell horse-harness fittings were found in a horse-and-chariot pit from the Qianzhangda site of Shandong (Shandong 2001). No bronze bits, cheek pieces, or harness strip pieces or ends were found.

Since not a single weapon was found in the pit, this was not likely a warrior’s wagon. Because the chariot was colourfully decorated with paint and furnished with textiles, it was probably used for recreation and personal convenience.
32a
Pair of Triangular Yoke-Terminal Fittings
Bronze
Length 13.2 cm, width 6 cm
Royal Ontario Museum, 934.17.53–54
The Bishop William C. White Collection

32b
Pair of Rectangular Box Fittings
Bronze
Length 15.3 cm, width 3.3 cm (934.17.123)
Length 15.6 cm, width 3.3 cm (934.17.124)
Royal Ontario Museum, 934.17.123–124
The Bishop William C. White Collection

32c
Zhong Pole-End Holding
Bronze
Length 16 cm, width 7 cm
Royal Ontario Museum, 960.234.38
The Dr. James M. Menzies Collection

32d
Pair of Axle Caps
Bronze
Length 15.2 cm, diameter 4.6 cm (935.50.4)
Length 14.3 cm, diameter 4.5 cm (935.50.5)
Royal Ontario Museum, 935.50.4–5
The Bishop William C. White Collection

32e
Zhong Pole Fitting
Bronze
Length 41 cm
Royal Ontario Museum, 934.17.52
The Bishop William C. White Collection
32f  
Pair of Cheek Pieces  
Bronze  
Length 7.5 cm, width 6.6 cm (940.234.457)  
Length 7.5 cm, width 6.9 cm (940.234.458)  
Royal Ontario Museum, 940.234.457–58  
The Dr. James M. Menzies Collection

32g  
Bit  
Bronze  
Length 13.9 cm  
Royal Ontario Museum, 925.26.168  
The Bishop William C. White Collection

32h  
Bosses  
Bronze  
Average diameter 2 cm  
Royal Ontario Museum, 934.17.88, 934.17.93, 934.17.95, 934.17.105  
The Bishop William C. White Collection

32i  
Yoke-Saddle Terminal Cap  
Bronze  
Length 5.6 cm, diameter 3.8 cm  
Royal Ontario Museum, 935.50.2  
The Bishop William C. White Collection

32j  
Animal-Mask Yoke Fitting  
Bronze  
Length 5.4 cm, width 6.5 cm  
Royal Ontario Museum, 930.21.205  
The Bishop William C. White Collection

32k  
Bell  
Bronze  
Height 3.5 cm, width 3.5 cm  
Royal Ontario Museum, 934.17.46  
The Bishop William C. White Collection

32l  
Yoke-Saddle Lining  
Bronze  
Length 47 cm, width 5.1 cm  
Royal Ontario Museum, 915.7.26  
Gift of Sir Robert Mond
Sanxingdui material culture is all the more mysterious for its lack of written records. Before writing was diffused to the archaic states of western China during the second century BC, the only writing that existed in the region was indecipherable hieroglyphs and pictographic symbols found mostly on weapons dated to the Eastern Zhou (fifth to third centuries BC). This kind of inscription can be seen on a spearhead (mao) in the ROM collection (Cat. no. 37). So far, about two hundred individual pictographs have been recognized; common symbols include human face, human hand, tiger, animal mask, dragon, flower, bird, and cicada, as well as abstract forms. Because almost all of these symbols were found as inscriptions on bronze weapons belonging to the Ba and Shu states of ancient Sichuan, they have been classified as “Ba-Shu scripts.” Scholarly opinions differ, however, as to whether the Ba-Shu scripts represent a local form of early writing. Although these symbols, or combinations of them, might indeed have been used to express words and thoughts whose meanings are now lost to us, the fact is that such scripts were never developed into a full writing system.

A few abstract or numbering symbols have been found on Sanxingdui pottery vessels, such as the high-stemmed dou dish (Cat. no. 2). Some scholars argue that these are an early form of the later Ba-Shu scripts; however, current archaeological evidence suggests that any connection between the two is remote. In central China, more complicated designs incorporating these kinds of symbols were found extensively on later Neolithic pottery at a site dated to 2500 BC; whether they represent the earliest form of writing is still open to question (Duan 1991; Qu et al. 1993).

On the other hand, inscriptions incised on animal bones (mostly tortoise shells and ox scapulas) found at Anyang are accepted with certainty as representing a fully developed writing system of the Shang dynasty. These inscriptions are records of Shang divining rituals, which involved chiselling, drilling, and heating of the bones. The effects on the bones of these actions were interpreted in response to divining questions. These bones, with or
without inscriptions, are thus called divining or oracle bones. Since the first oracle bones were recognized as such in 1899, about 150,000 pieces have been collected as well as archaeologically excavated from the royal court at Anyang (Zhongguo 1994:148–87; Wang and Yang 1999). The latest significant discovery of oracle bones is a storage pit (Huayuanzhuang H3) found near Xiaotun village in 1993, which yielded 1608 pieces, 579 of which have inscriptions. Most importantly, more than half of these oracle bones are complete or nearly complete, with substantial inscriptions, some up to two hundred words long (Yang and Liu 1998:178–79).

Scholars agree that the Anyang oracle-bone inscriptions had the capacity to embrace all the essential elements of the Chinese writing system: pictography, ideography, and phonetic compounds (see Hsu 1996:10–14). Many believe that the prototype of this system must have developed prior to its application on oracle bones of the Late Shang period, but archaeological evidence for earlier forms of writing is still scarce. So far, only a few true writings dating before the Anyang period have been identified; these were found at the Zhengzhou Erligang and Xiaoshuangqiao sites, and at the newly discovered Huaabei Shang city (Hanen 1993, 1996; J. G. Tang, personal communication). Traces of red-painted pottery inscriptions on pottery wares found at Xiaoshuangqiao, 150 km south of Anyang, suggest that the earliest writing of newly discovered Huanbei Shang city (Henan 1993, 1996) have been identified; these were found at the Zhengzhou Erligang and Xiaoshuangqiao sites, and at the newly discovered Huaabei Shang city (Hanen 1993, 1996; J. G. Tang, personal communication). Traces of red-painted pottery inscriptions on pottery wares found at Xiaoshuangqiao, 150 km south of Anyang, suggest that the earliest writing of the ancient Shang might indeed be associated with pottery (Hanen 1993). While as yet pottery inscriptions that date before the Late Shang period do not appear to be based on a full system of writing, there is no doubt that divining rituals at Anyang played a vitally important role in the development of ancient Chinese writing.

The divining ritual was a momentous occasion in Anyang society, because members of the aristocracy relied on the guidance of diviners for decision-making. Although early Chinese peoples were using animal bones for divining purposes as early as five thousand years ago, the use of tortoise plastrons did not become commonplace until the Shang period (Hsu 1996:897–904). The answer being sought in a divination was interpreted from the bone-crack pattern that resulted after chiselling and drilling the bones or tortoise shells to produce a series of hollows, and then heating them (Cat. no. 33). The divination process could provide only binary responses of “yes” or “no,” depending on how the bone cracked. Questions therefore had to be phrased such that the answer could be only “yes” or “no,” for instance, “Should we attack so-and-so on this day?” and “Should we not attack so-and-so on this day?” Some of the oracle bones were not inscribed with divining questions; they may have been part of a ready supply of “blanks,” or they may represent rejects due to unsatisfactory chiselling or drilling. But those with inscriptions are precious documents that record actual social life at Anyang during the Shang dynasty, including activities of worship, warfare, hunting, and feasting. These records in turn provide information on agriculture, climate, geography, astronomy, the calendar system, health, and much more (Wang and Yang 1999).

The practice of incising inscriptions on bronzes appeared near the end of the Shang era, but such inscriptions had quite a different purpose from those on oracle bones. Anyang bronze ritual vessels were highly prized possessions of a Shang noble family, to be used in ritual ceremonies (see Chapter 4), and the purpose of the inscriptions on them was exclusively to identify the owner by means of a clan totem or symbol and/or the official state title of the owner. For example, on thirty-three of forty-four ritual vessels from the M160 tomb of Anyang (Chapter 4), the inscription “yu-ju” appeared repeatedly, suggesting that the owner was a high-ranking military official from the upper class of Anyang society. And it is from the inscriptions on bronze vessels recovered from Anyang’s splendid Fu Hao tomb that we know the occupant was a consort of King Wu Ding as well as a military official. In some cases, however, scholars have been unable to decipher the meaning of such bronze inscriptions, for instance, the one on a gu vessel in the ROM collection (Cat. no. 17), although, based on archaeological evidence, such inscriptions are still thought to represent clan totems or family names. It was not until the Western Zhou period that bronze inscriptions became more elaborate, with full descriptions about events of war, feasting, and tributes.

The Royal Ontario Museum houses one of richest collections of oracle bones outside China, most of which (more than eight thousand pieces) were collected or were sold outside China. The ROM collection of oracle bones has been well studied and published by Dr. James Hsu, a former ROM curator and an oracle-bone specialist (Hsu 1979, 1988). The following examples have been drawn from his research and publication.
Dorsal

Underside

On the beautifully polished dorsal side of this shell, “two” is incised as a crack mark both on the left and on the right, just above two T-shaped cracks. This means that the pair of “charges” or questions, one in positive and one in negative form, engraved next to the crack marks had been submitted to the divining process twice (the questions were asked twice). Usually, a pair of charges was submitted several times, resulting in several pairs of cracks. The cracks resulted when the tip of a glowing brand was pressed against hollows that had been cut in advance on the underside of the shell. This shell has six cracks on the right, six on the left, and four more in the central area, but only two are distinguished with an inscription. The other fourteen cracks may have been made in response to the engraved charges, or to other charges that were not inscribed. The diviner interpreted the cracks as favourable or unfavourable. There was no positive or negative value associated with specific kinds of cracks; rather, just before the cracks were made, the diviner would announce what shape would be considered favourable.

Each of the two charges is preceded by the words “It was divined.” Thus, the inscription on the right-hand side reads, “It was divined: ‘Father Yi will cause harm?’” and on the left-hand side, “It was divined: ‘Father Yi will not cause harm?’” The two inscriptions physically mirror each other: on the right-hand side of the shell, the columns are engraved from left to right, whereas on the left-hand side, they are engraved from right to left.

The tortoise shell has sixteen elongate oval-shaped hollows chiselled into the ventral side. There are also four inscriptions on the ventral side. Two are of an administrative nature, referring to the acquisition and preparation of the tortoise shell. The inscription on the right margin reads: “Gong offered 300 shells.”
This shell has the crack mark “one” incised six times. Four inscriptions are incised near the lower four crack marks. They are ordered from right to left, beginning at the bottom. The practice of starting at the bottom began in the later part of the First Period at Anyang (c. 1240–1180 BC).

The first inscription (bottom right) reads, “It was divined: ‘We should offer a purification ritual to Qiang-Jia, and sacrifice a registered animal?’”

The second inscription (bottom left) gives the negative form of the charge, and adds the name of the diviner and the date of the divination: “Crack-making on renxu day, Zheng divined: ‘We should not offer a purification ritual?’”

The third inscription (middle right) reads, “It was divined: ‘We should make an ablution.’”

The fourth inscription (middle left) is broken off, but would have been the negative form of the charge in the third inscription.

The administrative inscriptions on the back side of the shell are only partially preserved. The one on the right reads, “On ding [. . . ] day [. . . ] 20.” The one on the left reads, “Sao.” The similarity of these inscriptions to those on the previously described tortoise shell (Cat. no. 33) make it likely that the two shells came from the same source.
Besides the inscription, the tiger bone was embellished with carved motifs similar to those on ritual vessels and other carved bones. The carvings include a lively representation of the tiger itself, a dragon, a cicada, and an animal-face taotie. What makes this bone most extraordinary is that all the carvings, including the inscriptions, were inlaid with turquoise, a very precious material during the Shang period. This rare and unique artifact has attracted much scholarly attention and has been extensively documented and published.

37 Mao Spearhead with Ba Emblems
Bronze with inscriptions
Length 22.2 cm
Eastern Zhou dynasty, 475–221 BC
Anyang site, Henan province
Royal Ontario Museum
Gift of Joey and Toby Tanenbaum, 2000

The wide blade edges and the short, slightly broad socket of this mao spearhead are typical features of this classic type of Ba weapon from the Sichuan region of western China during the Warring States period (475–221 BC). The spearhead’s distinctive local feature is a raised median ridge between the two faces of the leaf-shaped blade, which makes the Sichuan spearhead radically different from its counterparts in northern China. On the sides of the socket are the remains of small ear-shaped loops. In addition to its characteristic Sichuan features, this Ba spearhead is inscribed with unmistakable Ba emblems commonly seen on sockets or handles of weapons. There were three pictographs on each side of the socket, a human face mask, a tiger, and a running figure (from top to bottom) on one side, and a hand, a fork, and a bird’s head on the other side. All are typical components of Ba scripts.

Although Shang divining bones were mainly tortoise shells and ox scapulas, bones of horse, pig, goat, and deer were also used. Tiger bones were never used for divinations, because they were too rare and precious. This tiger bone is an extremely important documentation of a Shang social event—not only is it a trophy of a royal hunt, but it also records the event. On the ventral side of the tiger bone is written: “During the period of offering of the Xie ritual on the xinyou day of the eleventh month of the third year of the King’s reign, the King hunted on the slopes of Mount Ji. He caught this very large and ferocious tiger.”
Our knowledge of the ancient societies at Sanxingdui and Anyang relies mostly on archaeological materials from burial pits. Artifacts recovered from a substantial number of burials from every level of society at Anyang suggest that distinctive funerary rituals were a significant part of Shang social life. At Sanxingdui, the two so-called sacrificial pits were the only sources to shed new light on the funerary traditions of this region. In contrast to what we see at Anyang, Sanxingdui funerary goods tell us little about burial rituals of this mysterious culture in western Sichuan.

The artifacts recovered at Sanxingdui, especially the spectacular bronze figures and masks, leave no doubt that Sanxingdui society had a solemn hierarchical organization. It is puzzling, however, that ongoing archaeological investigations within the perimeter of the Sanxingdui city ruin have yet not discovered any burials that seem to be appropriate for high-status members of the society. No opulent burials and only a few common burials from a small number of residential areas have been found. So far, only four small burials have been excavated inside the city (Sichuan et al. 1987a). These were simple earthen pits whose purpose seems to have been merely functional. They have yielded no evidence of burial ritual. The only cemetery found to date was discovered during the 1997–1998 excavations. It is located at Renshengchun Village, about 500 m beyond the west wall (Sun 2000c; Chen De’an, personal communication). There were twenty-nine shallow rectangular graves arranged in rows parallel to the west wall. The dead were buried with their heads towards the riverbank. Burial goods were undistinguished; only a third of the burials yielded offering goods, such as jades, stonewares, and pottery, and there were only a few such goods in these burials. Most burials contained remains of large mammal bones, including elephant tusks, but whether or not these bones and tusks were sacrificial is unclear. All in all, archaeological evidence provides little information about Sanxingdui burial rituals; nevertheless, the location of the Renshengchun cemetery outside the city ruin does suggest the possibility that large elaborate burials may also be found there.

At Anyang, on the other hand, more than six thousand burials have been excavated since 1928. They fall into four categories that reflect the classes of Shang society: royal tombs, noble tombs, commoner burials, and sacrificial pits and simple slave grave pits. These four types of burials differ in size and shape as well as in the kinds of grave goods they contained. The first three kinds of burials, with a few exceptions, reveal certain patterns involving three aspects of funerary custom: preparation and construction of the grave site and tomb, human and animal sacrifice, and placement of funerary goods (see Tang 1998, 1999).
The location of a tomb was carefully selected in terms of its suitability to the status of the deceased. To date, nearly a dozen large cemetery sites have been found within the Anyang perimeter, some, such as Yinxu Xidi, with more than a thousand graves (Zhegao 1979). These groups of burials are considered to be clan cemeteries. The royal cemetery on the high terrace of Xibeigang consists of fourteen large-scale tombs; eight of them each have four ramps, one on each side of a rectangular shaft, and the other six have one or two ramps each. Royal tombs with no ramps were also found here and within the royal court enclosure at Xiaotun. The burial chambers of royal tombs can be up to 30 m² in area, and the ramps can be up to 20 m in length. More than a thousand years ago, all the tombs here were looted, leaving little evidence as to the identity of the owners. Before 1999, archaeologists believed that the tombs at Xibeigang belonged to Anyang’s kings and closely related royal-family members, because up to that date all the large tombs with four ramps were found here. But in 1999, investigation at the Lijiazhuaqiang clan cemetery revealed a large tomb with four ramps (ALM1046), the only one of this kind found outside the Xibeigang royal cemetery. Why this king-sized tomb was placed in a clan cemetery rather than with the royal group is unclear, but this discovery certainly challenges long-held evidence as to the identity of the owners. Before 1999, archaeologists believed that the tombs at Xibeigang belonged to Anyang’s kings and closely related royal-family members, because up to that date all the large tombs with four ramps were found here. But in 1999, investigation at the Lijiazhuaqiang clan cemetery revealed a large tomb with four ramps (ALM1046), the only one of this kind found outside the Xibeigang royal cemetery. Why this king-sized tomb was placed in a clan cemetery rather than with the royal group is unclear, but this discovery certainly challenges long-held views on the nature of the royal and distribution of the tombs at Anyang.

Noble tombs had one or two ramps, or no ramp at all (Fig. 13). The ramp or ramps led to the bottom of the rectangular earthen pit, where a “secondary ledge,” a conventional term used by Anyang archaeologists to describe a man-made platform along the edge of the pit, was built for the placement of funerary goods. An earthen chamber pit was dug down into the burial pit, where elaborate wooden coffins were placed. These tombs were distributed in various clan cemeteries, for example, M160 and M172 in the Guojiazhuang cemetery (see Chapter 6), M9, M12, and M48 in the Hougang cemetery, and the newly recovered M54 (see below) and M60 in the Huayuanzhuang cemetery. Clearly, the occupants of these tombs were leading members of these clans, which constituted basic social units in Shang society. Although, so far, only three noble tombs, Xiaotun M9 (the tomb of Fu Hao), Guojianzhuang M160, and Huayuanzhuang M54, have been found that were fortunate enough to escape the depredations of looters, they have provided sufficient evidence for us to reconstruct Anyang burial rituals.

The most important aspect of Anyang funerary ritual is human and animal sacrifice. All royal and noble tombs have both human and animal sacrificial remains; the higher the status of the tomb’s owner, the greater the number of sacrificial victims, which ranged from half a dozen to more than a hundred. The human victims were likely slaves owned by the deceased, perhaps acquired as prisoners of war. Dogs were the most popular sacrificial animals for commoners’ burials. Pigs, horses, and oxen were used as well. As mentioned in Chapter 4, elephants may have been sacrificed also. Human and animal sacrifices were typically found at several locations within the tomb—on the ramps, on the secondary ledge, especially in a small pit (yangpeng) dug at the bottom of the chamber beneath the coffin, and sometimes in backfill soil layers—clearly suggesting that sacrifices were made at various stages of burying, from construction of the pit to final backfilling (Tang 1999).

Ritual human sacrifice to ancestors was also customary after funerals. There were about 1400 ceremonial sacrificial pits in the southeastern part of the royal cemetery at Xibeigang. A special ancestral sacrifice site was found at Hougang, containing numerous sacrificial human and animal remains, as well as objects (Lui and Xu 1998). Human skulls and bones were probably used repeatedly, because some were carved with inscriptions that signified the names of ancestors. The Royal Ontario Museum collection has a fine example of a human skull fragment inscribed with the name of Fu Hao, 5th king of the Shang dynasty, to whom the sacrifice was made (Cat. no. 38). Interestingly, the Hougang sacrificial pits indicate a similarity to Sanxingdui sacrifice ritual—burning. The pits were filled with burned textiles, grains, and charcoal.

Placement of grave goods within burials was another important part of funeral ritual. As noted earlier, the occupant’s status determined the quality and quantity of such goods (see Chapter 4). While bronze ritual vessels were reserved for the aristocracy, most—regardless of the tomb occupant’s social status—were pottery wares, either daily utensils used by persons when they were alive or objects made especially for funeral rituals (Cat. nos. 8–10). Precious personal items, such as jade pendants and ornaments, were customarily buried with their owners, and were found close to the body inside the coffin. Objects having ritual significance, such as bronze vessels, were normally placed in the small gaps between the inner, middle, and outer coffins, and between the outer coffin and the chamber walls; on the secondary ledge; and in backfill soil.

In addition to the evidence of burning mentioned above, two aspects of Anyang funerary ritual offer some interesting comparisons with Sanxingdui rituals: intentional damage to offering goods, and the use of cowry shells (Tang 1999). Although it was not common practice, evidence from Anyang tombs does suggest...
that some objects, pottery vessels in particular, were intentionally broken during the burial ritual. Fragments of pottery were deliberately scattered on the secondary ledge and on top of the outermost coffin in some burials, while jades and bronze weapons were found broken and bent in other burials, although, again, such findings were uncommon. On the other hand, it was quite common at Anyang to place cowry shells in the mouth of the deceased and to bury them with loss of cowry shells (Kondo 1998). Thousands of cowry shells were recovered from Sanxingdui pits, and most of them were contained within a few bronze ritual vessels, suggesting that they were offerings. At Sanxingdui there was a greater quantity of shells per burial than at Anyang, but their ritual function is less understood at Sanxingdui. It is clear nevertheless that these imported cowry shells had an important symbolic significance at both sites.

**THE HUAYUANZHUANG M54**

In late 2000 and early 2001, archaeologists from the Anyang Working Station of the Institute of Archaeology, Chinese Academy of Social Science, conducted a rescue excavation to recover an intact noble tomb, Huayuanzhuang M54 (Xu and He 2001a, 2001b). This tomb ranks in importance with Xiaotun M5, the Fu Hao tomb, discovered in 1975, and the Guqianzhuang M160 excavated in 1990. It is introduced here for the first time in English to illustrate some of the aspects of Anyang ritual described above.1

The noble tomb Huayuanzhuang M54 is located about 100 m east of Huayuanzhuang village in the suburban area of present-day Anyang city. It is in the southern part of the Xiaotun royal court enclosure, about 50 m from the south defensive ditch and about 100 m from the Huaihe River in the east. The Fu Hao tomb is 500 m to the northwest, and the newly found oracle-bone pit Huayuanzhuang H3 (see Chapter 7) is 50 m to the southwest.

The tomb, like many other noble tombs, has an east–west orientation, and has no entrance ramp. It is a large earthen pit about 5.04 m long by 3.3 m wide. The bottom of the pit, where a large burial chamber was dug out, is about 6.2 m below ground level (Fig 14).

The backfill mixture consisted of reddish brown and light yellow soils, deposited and tamped in layers, which was normal practice. In the backfill the remains of nine sacrificial dogs were found; five of the dog skeletons were still intact with small bronze neck bells. In addition, two sacrificial human skulls were identified but the rest of these skeletons were missing.

The walls at the bottom of the pit were built out with tightly compacted loess soil to form a secondary ledge about 80 cm in depth and 1.5 m in height on all four sides of the pit. The south-wall ledge was covered with fragments of pottery *gui* wares, which were intentionally broken before burying. Sacrificial offerings on the rest of the ledge included three human heads, five dogs, one bull leg, and two sheep legs, along with intentionally damaged fragments of pottery *gui*, *dou*, *gu*, and *jue* wares, and a few wooden sticks painted red and black. Three complete human skeletons were recovered from within the ledge structure, two at the east side and one at the west side, clear evidence that ritual human sacrifices were being made before or during construction of the ledge.

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As is usual, a small T-shaped sacrificial pit (*yaokeng*), 1.1 m long and 60 cm wide, was dug out in the centre of the burial chamber. A human with a jade axe was buried in one side of the pit and a dog in the other side. Traces of three coffins, one inside another; inside a third, can be clearly discerned, although the coffins themselves are completely disintegrated. The cover of the outermost coffin was made of twenty-one wooden slabs about 5 cm thick,
cat. no. 39c.

Dagger-axes with large blades were placed together with the ritual vessels. Except for the jades, all the ritual materials, including bronzes and pottery wares, were placed in between the middle and innermost coffins. All types of ritual jade—gu, blade, bi, blade, bi disk, cong (formerly zhong) tube, yue blade, huan ring, jue ring—are present, although there are not many. Except for the cong tube, which was placed under the deceased's back, all the ritual jades were laid beside the body. As with many other tombs of this scale, most of the jades were personal pendants and ornaments. The excavators reported that the pendants in shapes of animals, including dragons, ducks, and animal masks, were carved as delicately as those from the Fu Hao tomb (see Chapter 5). The jades of M54 are one of the finest collections yet found, surpassed only by that of the Fu Hao tomb.

Interestingly, there are a few collared bi disks with incised lines on both the obverse and the reverse, very similar to those seen at Sanxingdui (Bagley 2001, cat. nos. 61–62). The striking resemblance between Anyang and Sanxingdui collared bi disks, from raw material to carving technique, raises the question among scholars whether the jades from both sites came from the same workshop; further investigation is needed to answer this question.

Not surprisingly, a number of cowry shells were found as a bedding layer underneath the body, but there were none in the mouth of the deceased, who was reported to be a male about thirty-five-old when he died. According to pottery typology, which usually provides the best clues for dating (see Chapter 3), tomb M54 is assigned to later Period II of Anyang occupation, slightly later than the tomb of Fu Hao, but much earlier than the M160 tomb.

There are two indications that the tomb occupant was a high-ranking military leader as well as a member of the noble class. First, the large bronze ritual yuan axe, similar to one found in the tomb of Fu Hao, who was also a military leader, is a symbol of military power and authority. An extremely rare set of seven such bronze yuan axes was placed in this single tomb. In addition, the tomb held a large number of other bronze weapons, which suggests that the occupant was a military man. Second, a majority of the bronze vessels have inscriptions that identify the tomb owner as “yu zhang.” “Yu” is a title of Shang military rank, and it also appears on vessels belonging to the owner of tomb M160 (see Chapter 7). “Zhang,” according to oracle-bone documentation, refers to a high-level clan of the Shang dynasty. The same clan identity was found on vessels from another late Shang noble tomb, discovered in 1997 at Luyi in Henan province, about 450 km south of Anyang (Henan and Zhouchao 2000). That members of the Zhang clan had such grand tombs suggests that this clan was indeed an important component of the aristocracy and the Shang royal court. The archaeological evidence confirms once again the accuracy and reliability of oracle-bone inscription records.

All the evidence from tomb M54 points to the importance of funeral ceremonies as major events in Shang society that followed a certain regularity. Reconstruction of Sanxingdui funerary ritual is not yet possible, but similarities to aspects of Anyang sacrificial practices and burial goods, which have been noted above, suggest links between the two regions that will become clear only through future study.

were once filled with liquid, presumably wine, also placed in offering. Carbonized grain and fruit remains found inside bronze gui vessels and pottery lei pots suggest ritual offerings of these foods as well (Zhan et al. 2001). Clearly, offerings of food were an important part of Anyang funerary rituals.
38

Human Skull Fragment with Inscription
Bone
Length 3.9 cm, width 4.9 cm
Late Shang dynasty, 1300–1050 BC
Probably Anyang, Henan province
Royal Ontario Museum, 971x129.1000
Published: Hsu 1979, cat. no. B19.4.

This sacrificial human skull was inscribed with the name of Tai Jia, the 5th king of the Shang dynasty. This piece was no doubt used in a sacrifice ritual to Shang ancestors at Anyang. (The first king to rule at Anyang was probably Pan Geng, the 20th king.)

39a

Red Lacquer Impression
Clay
Length 10 cm, width 9 cm
Late Shang dynasty, 1300–1050 BC
Probably Anyang, Henan province
Royal Ontario Museum, 949x143.1

Ashes are often all that remains of lacquer vessels and containers that were among the offering objects buried in tombs. The same is true for coffins, which often had surfaces decorated with red lacquer paint. However, traces of parts of these objects have survived as impressions on the compacted tomb-backfill soils. These three pieces of clay show incomplete animal-face taotie motifs and patterned designs that were likely part of the decoration on elaborate coffins belonging to nobles. Although the provenance of these fragments of red lacquer impressions is unknown, it is believed that they were likely collected from royal or noble tombs at Anyang.
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