

# Early Civilizations

There was a time, the story goes, when all the peoples of the earth shared a common language and could accomplish great things. They developed new technologies, made bricks, and aspired to build a fortified city with a tower reaching to the sky. But their god was troubled by this, so he destroyed their civilization by making it hard for them to understand one another's speech.

We know this as the legend of Babel. It's a story that probably circulated among peoples of the ancient world for thousands of years before it became part of the Hebrew book we call by its Greek name, Genesis, "the beginning." This story lets us glimpse some of the conditions in which the first civilizations arose, and it also reminds us of the ruptures that make studying them hard. We no longer speak the same languages as those ancient peoples, just as we no longer have direct access to their experiences or their beliefs.

Such foundational stories are usually called *myths*, but they are really an early form of history. For the people who told them, these stories helped to make sense of the present by explaining the past. The fate of Babel conveyed a crucial



Before  
You  
Read  
This  
Chapter

## STORY LINES

- Historians gather and interpret evidence from a diverse array of sources, many of them environmental, visual, and archaeological.
- All civilizations emerge as the result of complex historical processes specific to a time and place, yet all share certain defining features.
- Prominent individuals can come to power through the use of force, but maintaining power requires legitimacy.
- Those wielding power in ancient Mesopotamia and Egypt responded in different ways to the challenge of establishing legitimacy.

## CHRONOLOGY

11,000 B.C.E.	Neolithic Revolution begins
7500–5700 B.C.E.	Çatalhöyük flourishes
6500–3000 B.C.E.	Jericho flourishes
4300–2900 B.C.E.	The rise of Uruk in Sumer
c. 3200 B.C.E.	Development of writing
c. 3100 B.C.E.	King Narmer unites Upper and Lower Egypt
2900–2500 B.C.E.	Early Dynastic Period in Sumer
c. 2700 B.C.E.	Reign of Gilgamesh
c. 2686–2160 B.C.E.	Old Kingdom of Egypt
c. 2650 B.C.E.	Imhotep engineers the Step Pyramid for King Djoser
c. 2350 B.C.E.	Sargon of Akkad consolidates power in Sumer
2160–2055 B.C.E.	First Intermediate Period in Egypt
2100–2000 B.C.E.	Ziggurat of Ur constructed
2055–c. 1650 B.C.E.	Middle Kingdom of Egypt
c. 1792–1750 B.C.E.	Reign of Hammurabi

## CORE OBJECTIVES

- UNDERSTAND** the challenges involved in studying the distant past.
- DEFINE** the key characteristics of civilization.
- IDENTIFY** the factors that shaped the earliest cities.
- EXPLAIN** how Hammurabi's empire was governed.
- DESCRIBE** the main differences between Mesopotamian and Egyptian civilizations.

message: human beings are powerful when they share a common goal, and what enables human interaction is civilization. To the peoples of the ancient world, the characteristic benefits of civilization—stability and safety, government, art, literature, science—were always products of city life. The very word “civilization” derives from the Latin word *civis*, “city.” Cities, however, became possible only as a result of innovations that began around the end of the last Ice Age, about 13,000 years ago, and that came to fruition in Mesopotamia 8,000 years later. The history of civilization is therefore a short one. Within the study of humanity, which reaches back to the genus *Homo* in Africa, some 1.7 million years ago, it is merely a blip on the radar screen. Even within the history of *Homo sapiens sapiens*, the species to which we belong and which evolved about 50,000 years ago, civilization is a very recent development.

The study of early civilizations is both fascinating and challenging. Historians still do not understand why cities developed in the region between the Tigris and the Euphrates rivers, in what is now Iraq. Once developed, however, the basic patterns of urban life quickly spread to other parts of the ancient world, both by imitation and by conquest. A network of trading connections linked these early cities, but intense competition for resources made alliances among them fragile. Then, around the middle of the second millennium B.C.E. (that is, “Before the Common Era,” equivalent to the Christian dating system B.C., “Before Christ”), emerging powers began to shape some fiercely independent cities into empires. How this happened—and how we know that it happened—is the subject of Chapter 1.

## BEFORE CIVILIZATION

More than 9,000 years ago, a town began to develop at Çatalhöyük (*CHUH-tal-hih-yik*) in what is now south-central Turkey. Over the next 2,000 years, it grew to cover an area of thirty-three acres, within which some 8,000 inhabitants lived in more than 2,000 separate houses. If this seems small, consider that Çatalhöyük’s population density was actually twice that of today’s most populous city, Mumbai (in India). It was so tightly packed that there were hardly any streets. Instead, each house was built immediately next to its neighbor, and generally on top of a previous house.

The people of Çatalhöyük developed a highly organized and advanced society. They wove wool cloth; they

made kiln-fired pottery; they painted elaborate hunting scenes on the plaster-covered walls of their houses; they made weapons and tools from razor-sharp obsidian imported from the nearby Cappadocian mountains. They honored their ancestors with religious rites and buried their dead beneath the floors of their houses. Settled agriculturalists, they grew grains, peas, and lentils and tended herds of domesticated sheep and goats. But they also hunted and gathered fruits and nuts, like their nomadic ancestors, and their society was egalitarian, another feature common to nomadic societies: both men and women did the same kinds of work. But despite their relatively diverse and abundant food supply, their life spans were very short. Men died, on average, at the age of thirty-four. Women, who bore the additional risks of childbirth, died at around age thirty.

The basic features of life in Çatalhöyük are common to all subsequent human civilizations. But how, when, and why did such settlements emerge? And how do we have access to information about this distant past? The era before the appearance of written records, which begin to proliferate around 3100 B.C.E., is of far greater duration than the subsequent eras we are able to document—and no less important. But it requires special ingenuity to identify, collect, and interpret the evidence of the distant past. In fact, historians have just begun to explore the ways that climatology, neuroscience, evolutionary biology, and genetics can further illuminate this period, augmenting the older findings of paleontology, archaeology, and historical anthropology.

## Societies of the Stone Age

Primates with human characteristics originated in Africa 4 to 5 million years ago, and tool-making hominids—species belonging to the genus *Homo*, our distant ancestors—evolved approximately 2 million years ago. Because these early hominids made most of their tools out of stone, they are designated as belonging to the Stone Age. This vast expanse of time is divided into the Paleolithic (“Old Stone”) and the Neolithic (“New Stone”) Eras, with the break between them falling around 11,000 B.C.E.

As early as 164,000 years ago, hominids in Africa were kindling and controlling fire and using it to make tools. The Neanderthals, a hominid species that flourished about 200,000 years ago, made jewelry, painted on the walls of caves, and buried their dead in distinctive graves with meaningful objects such as horns (blown to make music)



**CAVE PAINTINGS FROM LASCAUX.** These paintings, which date to between 10,000 and 15,000 B.C.E., show several of the different species of animals that were hunted by people of the Ice Age. The largest animal depicted here, a species of long-horned cattle known as the *auroch*, is now extinct.

and, in one case, flowers. Could these hominids speak? Did they have a language? At present, there is no way that we can answer such questions.

However, archaeology has shown that in the last phase of the Paleolithic Era, around 40,000 B.C.E., the pace of human development began to accelerate dramatically. Human populations in Africa expanded, suggesting that people were better nourished, perhaps as a result of new technologies. In Europe, *Homo sapiens* began to produce finely crafted and more-effective tools such as fishhooks, arrowheads, and sewing needles made from wood, antler, and bone. The most astonishing evidence of this change was produced by these new tools: cave paintings like those at Lascaux and Chauvet (in France). These amazing scenes were purposefully painted in recesses where acoustic resonance is greatest, and were probably intended to be experienced as part of multimedia musical ceremonies. This is almost certain evidence for the development of language.

Despite these changes, the patterns of human life altered very little. Virtually all human societies consisted of bands of a few dozen people who moved incessantly in search of food. As a result, these groups left no continuous archaeological record. Their lifestyle also had social, economic, and political limitations which help to explain the differences—both positive and negative—between these subsistence societies and those that can be called “civilizations.” Early humans had no domestic animals to transport goods, so they could have no significant material possessions aside from basic tools. And because they could not accumulate goods over time, the distinctions of rank and status created by disparities in wealth could not develop.

Hierarchical structures were therefore uncommon. When conflicts arose or resources became scarce, the solution was probably to divide and separate. And although scholars once assumed that men did the hunting and women the gathering, it is more likely that all members of a band (except for the very young and very old) engaged in the basic activity of acquiring food.

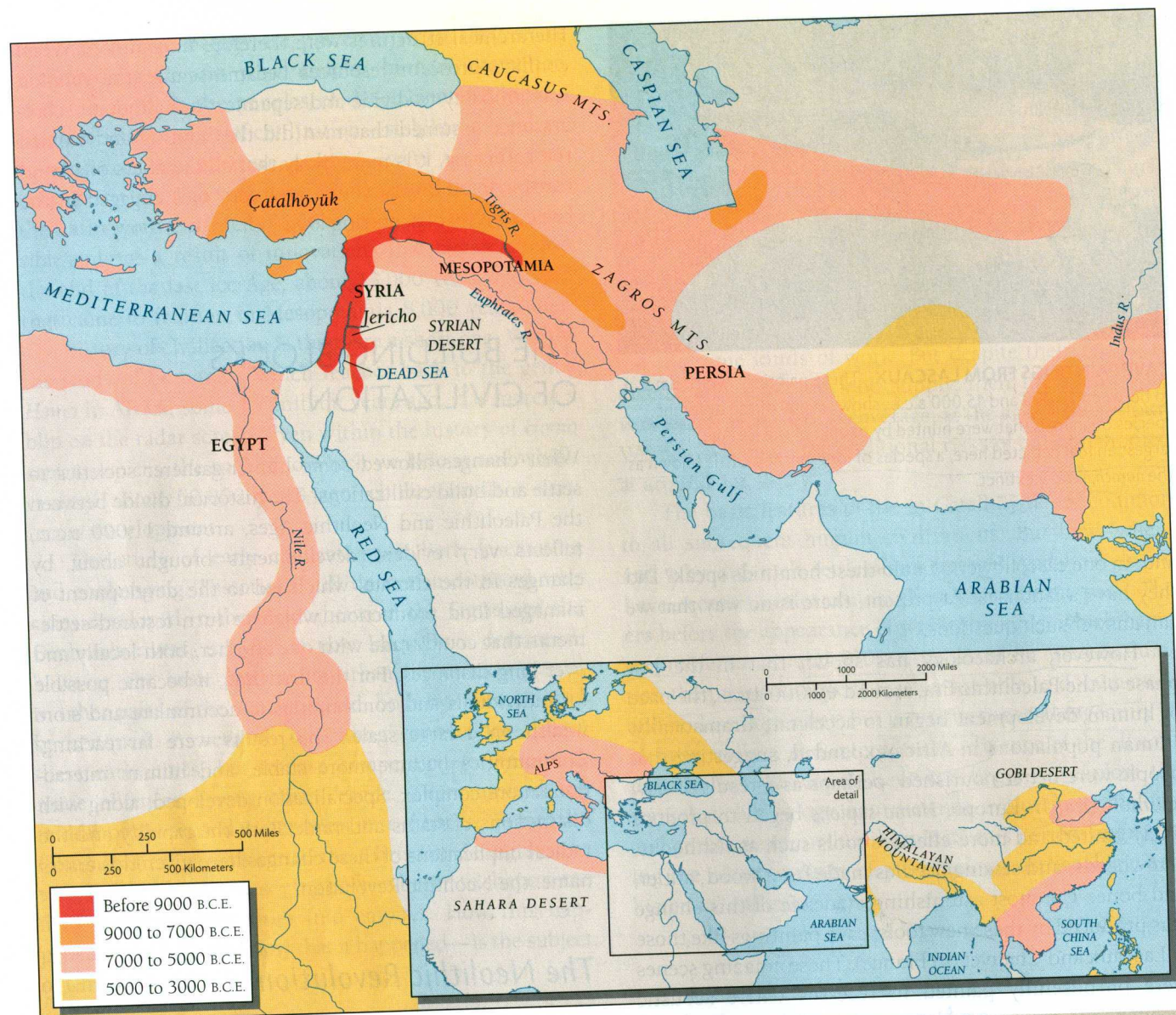
## THE BUILDING BLOCKS OF CIVILIZATION

What changes allowed some hunter-gatherer societies to settle and build civilizations? The historical divide between the Paleolithic and Neolithic Ages, around 11,000 B.C.E., reflects very evident developments brought about by changes in the climate, which led to the development of managed food production, which in turn fostered settlements that could trade with one another, both locally and over long distances. For the first time, it became possible for individuals and communities to accumulate and store wealth on a large scale. The results were far-reaching. Communities became more stable, and human interactions more complex. Specialization developed, along with distinctions of status and rank. Both the rapidity and the radical implications of these changes have given this era its name: the Neolithic Revolution.

### The Neolithic Revolution

The artists who executed the cave paintings at Lascaux and Chauvet were able to survive in harsh climatic conditions. Between 40,000 and 11,000 B.C.E., daytime temperatures in the Mediterranean basin averaged about 60° F (16° C) in the summer and about 30° F (–1° C) in the winter. These are very low compared to today’s temperatures in the city of Marseilles, not far from Lascaux, which average about 86° F (30° C) in summer and 52° F (11° C) in winter. This means that cold-loving reindeer, elk, wild boar, bison, and mountain goats abounded in regions now famous for their beaches and vineyards. But as the glaciers receded northward with the warming climate, these species retreated with them, all the way to Scandinavia. Some humans moved north with the game, but others stayed behind to create a very different world.

Within a few thousand years after the end of the Ice Age, peoples living in the eastern Mediterranean and



**THE GROWTH OF AGRICULTURE.** Examine the chronology of agriculture's development in this region. ■ **What areas began cultivating crops first, and why?** ■ **How might rivers have played a crucial role in the spread of farming technologies?**

some other regions of the world accomplished the most momentous transformation in human history: a switch from food-gathering for subsistence to food production. The warmer, wetter climate allowed wild grains to flourish, geometrically increasing the food supply. People began to domesticate animals and cultivate plants. Stable settlements grew into cities. This process took several thousand years, but it still deserves to be called "revolutionary." In a relatively short time, people altered patterns of existence that were millions of years old.

This revolution produced new challenges and inequalities. For example, well-nourished women in sedentary

communities can bear more children than women in hunter-gatherer groups, and so the women of this era became increasingly sequestered from their male counterparts, who in turn gave up an equal role in child care. The rapid increase in population was also countered by the rapid spread of infectious diseases, while dependence on carbohydrates resulted in earlier deaths than were typical among hunter-gatherers.

Eventually, increased fertility and birthrates outweighed these limiting factors, and by about 8000 B.C.E. human populations were beginning to exceed the wild food supply. They therefore had to

increase the food-growing capacity of the land and devise ways of preserving and storing grain between harvests. Some peoples had learned how to preserve wild grain in storage pits as early as 11,500 B.C.E., and they discovered that they could use this seed to produce even more grain the following year. The importance of the latter discovery cannot be overstated: deliberate cultivation could support larger populations and could also compensate for disasters (such as flooding) that might inhibit natural reseeding. Even more important, intensified seeding and storage provided humans with the stable and predictable surpluses needed to support domestic animals. This brought a host of additional benefits, guaranteeing a more reliable supply of meat, milk, leather, wool, bone, and horn, and also providing animal power to pull carts and plows and to power mills.

### The Emergence of Towns and Villages

The accelerating changes of the Neolithic Revolution are exemplified by towns like Çatalhöyük and by the simultaneous rise of trade and warfare—sure signs of increased specialization and competition. Hundreds, and probably thousands, of settlements grew up in western Asia (the "Near East") between 7500 and 3500 B.C.E. Some of these can be classified as cities: centers of administration and commerce with a large and diverse population, often protected by walls. Among the earliest of these was Jericho, in the territory lying between modern Israel and Jordan. Jericho emerged as a seasonal grain-producing settlement, and by 6800 B.C.E. its inhabitants were undertaking a spectacular building program. Many new dwellings were built on stone foundations, and a massive dressed stone wall was constructed around the western edge of the settlement. It included a circular tower whose excavated remains still reach to a height of thirty feet, a powerful expression of its builders' wealth, technical prowess, and political ambitions.

Jericho covered at least eight acres and supported 3,000 people, so it was even more densely settled than Çatalhöyük. It was sustained by intensive cultivation, made possible by irrigation, of recently domesticated strains of wheat and barley. Jericho's inhabitants also produced some of the earliest-known pottery, which allowed them to store grain, wine, and oils more effectively. Pottery's most important benefits, however, were in cooking. For the first time, it was possible to produce

nourishing stews, porridges, and ales. (The capacity to produce beer is a sure sign of civilization.) Pottery production was not only vital to ancient civilizations, it is vital to those who study them. As the techniques for making pottery spread throughout the Near East and Asia, identifiable regional styles also developed. By studying the different varieties, archaeologists can construct a reasonably accurate chronology and can also trace the movements of goods and people.

Jericho and Çatalhöyük illustrate the impact that stored agricultural surpluses have on human relations. For the first time, significant differences began to arise in the amount of wealth individuals could stockpile for themselves and their heirs. Dependence on agriculture also made it more difficult for individuals to split off from the community when disputes and inequities arose. The result was the construction of a much more stratified society, with more opportunities for a few powerful people to become dominant. The new reliance on agriculture also meant a new dependence on the land, the seasons, and the weather, which in turn led to new speculations about the supernatural. Different life forces were believed to require special services and gifts, and the regular practice of ritual and sacrifice ultimately produced a priestly caste of individuals or families who seemed able to communicate with these forces. Such spiritual leadership was allied to more worldly forms of power, including the capacity to lead war bands, to exact tribute from other settlements, to construct defenses, and to resolve disputes.

Trade was another important element in the development of early settlements. Local trading networks were already established around 9000 B.C.E., and by 5000 B.C.E., long-distance routes linked settlements throughout the region. Long-distance trade accelerated the exchange of ideas and information within the Fertile Crescent, and it further increased social stratification. Because status was enhanced by access to exotic goods from afar, local elites sought to monopolize trade by organizing and controlling the production of commodities within their own communities and by regulating their export. Certain people could now devote at least a portion of their labor to pursuits other than agriculture: making pottery or cloth, manufacturing weapons or tools, building houses and fortifications, or facilitating trade. Thus the elites who fostered and exploited the labor of others eventually became specialized themselves, with the leisure and resources to engage in intellectual, artistic, and political pursuits. The building blocks of civilization had been laid.