# The Origin of Civilization

Around 10,000–7000 years ago (8000–5000 BC), humankind experienced perhaps its most important revolution. The Neolithic revolution, as it is called, forever changed the interaction between humans and the world around us by introducing the basic ingredient that makes civilization possible: agriculture. In this sense, the Neolithic revolution made the rest of history possible. Though modern humans have existed for the last 150,000 years, it is only in the last few thousand years, since the discovery of agriculture, that civilization has existed.

We have no written records for the period in which this happened. In fact, it is considered prehistory, since humans had not yet begun recording their histories, but we can piece events together with the help of archaeology. It is important to note, however, that much of this information is guesswork, and dates are approximate at best. In addition, these dates correspond roughly to when events took place in the Middle East (the focus of this reading). Similar developments also took place elsewhere, but happened a little later.

## The Beginnings of Sedentary Life

Prior to the Neolithic agricultural revolution, people existed as hunter-gatherers, constantly on the move to feed themselves. They were organized in small nomadic groups, mostly bands of around twenty to thirty people, incapable of sustaining large populations because of their limited food supply and need to keep moving. They survived on hunting animals and eating vegetation, and would stay in one place only as long as they could forage food from that area. During the Paleolithic (Old Stone Age—before 10,000 BC), all humans were nomadic hunter-gatherers.

By the Mesolithic Period (Middle Stone Age—10,000–8300 BC—sometimes also called Epipaleolithic), starting in the Middle East, people began settling down in more permanent communities, engaging in intensive hunting and gathering. This means instead of moving around, hunting and gathering as nomads, they settled down in small settlements and gathered their food from the area around them. Such people living in Mesopotamia are known as the Natufians. The Natufians did not have agriculture, but they were hunter-gatherers who were able to live sedentary lives by collecting wild wheat and barley, and hunting gazelles and deer.

A number of factors aided in this change. First, in the wake of the last ice age, the climate slowly changed from cold and dry to warm and wet. Under these new conditions, the Fertile Crescent of Mesopotamia (the area between the Tigris and Euphrates Rivers in modern-day Iraq) became incredibly rich in plant and animal life. In fact, the climate became so humid that most of the Middle East was not dry and desert-like as it is today, but lush and teeming with biodiversity. Because of the abundance of food, the populations living there did not have to move around as much to survive, and they got used to more sedentary lives.

## The Neolithic Revolution

Around 9000 BC, the climate may have begun to change again, becoming colder and dryer once more. If this is true, this led to fewer resources, meaning that the land had a lower carrying capacity. People living in settlements had to return to nomadic hunting and

gathering, or else find a new way to survive. Many returned to the mobile way of life, but some stayed in their settlements. They began planting seeds and harvesting the resulting plants. They may have originally learned this skill in earlier times as a safety net to hold them over in years of less successful hunts, but in the new climatic situation farming started to become more common. There were probably also important factors besides the climate in this change, and the role of the climate in these developments in a point of controversy among scholars. Most people returned to nomadic hunting and gathering; it was only a notable few who began experimenting with farming for unknown reasons.

The people who remained sedentary did so by learning to plant nutritious wild grasses through trial and error. Slowly, they figured out what were the best seeds to plant, and they also selectively bred plants so that they became larger, more nutritious, and easier to harvest. The various wild grasses evolved into modern-day crops such as wheat and barley. This occurred over the course of centuries (from around 8300–7500 BC)**,** but this domestication ushered in a new age, the Neolithic Period (New Stone Age). This early stage, during which plants were first domesticated, is called the Pre-Pottery Neolithic A (PPNA).

In the Middle East, where this agricultural revolution first took place, the domesticated plants were primarily wheat and barley, which could be made into several different foods, such as porridge, leavened and unleavened bread, and beer. Figs, chickpeas, lentils, and peas were also cultivated. This seems to have been a very slow process, though, with many false starts. Neolithic farmers tried but failed to cultivate some plants, such as rye, which were rediscovered and domesticated later or in other parts of the world. The development of farming was not a process of linear progress; there were fits and starts, and many communities probably abandoned farming and only returned to it over time.

The next major step in the Neolithic agricultural revolution after PPNA was the Pre-Pottery Neolithic B (PPNB), which was characterized by the domestication of animals. Around 10,000 BC, people began domesticating wolves for hunting and defense, and these slowly became modern-day dogs. Animals such as sheep, goats, and pigs were domesticated between 8500 and 7000 BC and used for food. Like plants, animals were selectively bred to yield more food and also to become more docile so that they could be more easily handled by humans. Horned cattle were some of the last animals to be domesticated because they were aggressive and better able to defend themselves, and many early communities seem to have revered them in their religions. But by 6500 BC cattle too were domesticated, perhaps originally *for* religious purposes. Animals were used mostly for food, clothing, and their bones for tools; it would not be until after the Neolithic that animal power for farming was first used.

Another important development that came slightly later was the invention of pottery from baking clay. Pottery first appeared around 7000 BC, and allowed for the storage and transportation of food. Sometime between 6000 and 4000 BC the pottery wheel was invented, which allowed for the mass-production of pottery, and by this time specialized craftsmen appeared who made pottery for the rest of the population to use.

## Two Neolithic Settlements: Jericho and Çatal Hüyük

We can get good insight into the changes taking place in prehistoric human society by looking at the archaeological evidence from the Near Eastern settlement now known as

Jericho. Jericho was located in the Levant, in a lush oasis in the Jordan River valley. It was first inhabited by Natufians around 11,000–8500 BC, and had a population of about 150–250 people. These people had stone blades and grinding stones (querns) used to cut and process grasses, and wild-animal bones found on the site show that they also engaged in hunting. Each Natufian home, made of stone and mud brick, had its own storage pit. There seems to have been very little specialization of jobs, as almost everyone worked toward subsistence.

By 8500 BC, the people inhabiting Jericho seem to have transitioned from the sedentary hunter-gathers of the Natufian culture to a society based primarily on farming of barley and wheat, the most important crops in the Middle East. Between 8500 and 7300 BC Jericho grew rapidly, perhaps up to 1,500 people, thanks to the newly abundant food supplies. Notably, around 8000 BC a wall was built around Jericho with a tower, which represents early large-scale construction work. This wall and tower meant not only that people had enough time free from food production to accomplish this impressive task, but also that some sort of authority was able to organize and plan the endeavor. The settlement and wall continued to grow over time, until around 7300 BC, when Jericho was suddenly abandoned for unknown reasons.

Around the time Neolithic Jericho was being abandoned, another important city was just beginning to be populated—a site in Asia Minor (modern-day Turkey) called Çatal Hüyük. It is the largest and best-preserved Neolithic site known so far. It was occupied from about 7500 to 6000 BC. With intensive agriculture to feed the people living there, at its height Çatal Hüyük had a population of around 5,000 to 8,000 inhabitants. These people lived in homes clustered together with shared walls, organized like a honeycomb. There were no streets—people used the roofs as streets and accessed the buildings through the ceilings by ladders. The homes reveal that some people must have owned more than others, but they show no indications of different classes, nor is their evidence yet of social distinctions between men and women. Life in this early agricultural society seems to have been mostly egalitarian, but signs of developing inequalities are there.

Çatal Hüyük also shows evidence of trade, and its people adopted specialized crafts. There were craftsmen who worked in obsidian and bone, as well as weavers and bread makers. Importantly, Çatal Hüyük developed smaller satellite settlements devoted to farming, and these seem to have fed the population in the urban center. Wheat, almonds, peas, pistachios, fruit, and domesticated sheep provided the residents with a diverse diet. The people still hunted animals, but their way of life was sustained by the food produced through agriculture.

Jericho and Çatal Hüyük, when viewed together, give us a view of the changes in life from the time of the Natufian culture all the way down to the end of the Neolithic Period. The archaeological investigations of these sites show how life changed from the sedentary communities based around intensive hunting and gathering to larger settlements based on small scale farming, to massive and complex early cities that were supported through intensive agriculture.

## The Development and Spread of Agriculture

The Neolithic agricultural revolution first took place in the Middle East, probably because of the advantageous climate of Mesopotamia. But over time, agriculture spread to other fertile areas around rivers, such as Egypt around the Nile, the Indus River valley, and the Yellow River in China. From the Middle East, cultivation of wheat and barley spread eastward to India, and north to Europe. In addition to these, new crops, such as flax and cotton, were adopted around the Nile in Egypt. While the concept of agriculture no doubt spread from out of the Middle East, it also developed in some areas independently. In places such as China, sub-Saharan Africa, or the Americas, where there was little or no contact with the Middle East, agriculture was also discovered, though it took slightly longer. While wheat and barley were the main crops in the Middle East, in Mesoamerica they were maize, beans, and squash, in China the primary crop was rice, and in South America it was the potato.

## The Consequences of Agriculture

The domestication of plants and animals allowed people to live in large settled communities, and, barring famine, they had a reliable and predictable influx of food. Abundant food allowed for excess population—people who did not necessarily have to work as farmers—and these people could specialize in crafts, act as priests, fight as warriors, or become social leaders (aristocrats or kings). Because excess food allowed for specialized craftsmen and the congregation of people into settled communities, cities slowly developed. The Neolithic agricultural revolution had an unprecedented impact on human society, changing the way humans interacted with the world around them, and giving people the opportunity to create culture, complex religion, and the complex social interactions that we know as civilization.

In the urban settlements fed by agriculture, people could devote themselves to art, science, and religion. At both Jericho and Çatal Hüyük, for instance, there is abundant evidence for religious practices. On both sites, veneration of figurines, mainly of women and bulls, appears to have been common. In addition, at both sites some sort of ancestor worship took place in which skulls of the dead were dug up, covered with clay, and decorated to look as if they were living faces.

We must be aware, however, that the Neolithic revolution also had negative effects. Ninety percent of the history of modern humans was spent as nomadic hunter-gatherers. Humans evolved, both physiologically and psychologically, in the context of hunting and gathering. Humans were not designed for settled society, and it has brought physical and psychological challenges for humans.

For example, agricultural advancement meant that people had plenty of food and therefore could sustain larger populations, but it also meant that they had far less variety in their diet. Humans are supposed to have diverse diets, so settled populations could be less healthy. And as people clustered together in their permanent settlements, diseases spread more easily. Indeed, the cities that agriculture made possible are breeding grounds for disease. Also, changes in the environment became much more dangerous when people settled down. When there was a particularly bad season, nomads could just go someplace else, but settled humans faced crop failure, starvation, and mass death.

In addition, the creation of agriculture-based societies led to problems that are just as severe today as they have ever been. As societies become more complex, there is more

social stratification, including the creation of unequal classes and often a loss of power among women. As societies become more complex, it is less likely that goods will be distributed evenly. Privileged classes emerged, as did military classes (often controlled by the privileged classes) that led to larger-scale and more deadly warfare.

With the invention of agriculture, in a certain sense human kind lost its prehistoric innocence. Humans emerged from a state of nature to society, civilization, and culture. This brought great opportunities to humankind, but it is also the point at which most of the problems of modern-day society were born.

## Summary

- For most of our history, humans have been hunter-gatherers, living in small bands and constantly on the move.
- Around 10,000 BC, starting in the Middle East, some people began settling down in sedentary communities, practicing intensive hunting and gathering. The people who did this in the Middle East are known as the Natufian culture.
- Gradually, some of the settled communities started practicing agriculture, at which point the Neolithic agricultural revolution began. The climate may have had some impact on the adoption of agriculture.
- In the period known as the Pre-Pottery Neolithic A (PPNA), plants ere cultivated and domesticated. In the Pre-Pottery Neolithic B (PPNB) animals were domesticated. Domesticated plants and animals were gradually changed, through selective breeding, to make them more useful to humans.
- We can see the changes taking place in the Neolithic Period by looking at settlements such as Jericho and Çatal Hüyük. Settlements grew larger and more populated as agriculture made food more abundant, and people gradually adopted specialized trades.
- While agriculture was first developed in the Middle East and spread outward, it also developed independently in other places, such as China, sub-Saharan Africa, and the Americas.
- Agriculture allowed for complex urban societies, which allowed for the creation of art, science, and religion, and modern society as we know it, but also for the emergence of unequal classes, the subjugation of women, large-scale warfare, and endemic disease.