Caesarea Maritima: The Search for Herod’s City

By Robert J. Bull

Herod, the ancient world’s master builder, constructed a magnificent port city on the Mediterranean coast of Palestine. He called it Caesarea in honor of his Roman patron Augustus Caesar. Maritima distinguished it from the many other cities that bore this much honored name, notably Caesarea Philippa, another city in Herod’s kingdom, located inland at the source of the Jordan River.

According to the first century historian Josephus, who left us a detailed description, the port of Caesarea Maritima was as large as Piraeus, the port of Athens. If so, Caesarea was one of the two or three largest ports on the Mediterranean, indeed in the world.

The port of Caesarea was all the more remarkable because it was located on a 40-mile length of the Mediterranean shore that had no natural harbor, bay or inlet. The Mediterranean coast in the area of Caesarea is an uninterrupted line of sand and cliffs. Here, for the first time in history, Herod constructed a port on the open sea without benefit of any natural features whatever.
Herod chose the site precisely because the coast was so inhospitable to navigation. Commercial vessels of the period, for the most part, had to sail before the wind in the manner of square-rigged ships. To use nautical language, they could not sail very close to the wind or tack with ease. Moreover, ancient pilots used headlands and structures along the coastline to take their bearings. The stars, widely used at this time by desert travelers to determine direction, were only of secondary use to coastal shipping. Commercial vessels stayed close to shore not only to gain their bearings but also to take advantage of the breezes generated by the land. The prevailing winds in the eastern Mediterranean are out of the southwest, and it is from that direction that most storms come. This prevailing wind, combined with a strong north-flowing current, could make any trip along the eastern Mediterranean coast difficult.

The dangers of sailing along this coast were well-known, of course, since this was the route of the long-established Phoenician-Egyptian run. In a storm, a vessel sailing this coast would find
itself wind-driven toward shore, its course affected by the strong in-shore current, and in danger of shipwreck on the sands. The ship’s master could either drop anchor and attempt to ride out the storm, or put into a nearby harbor at the first sign of heavy weather—if there was a harbor nearby.

Between Dor (Dora) 8 miles north of Caesarea, and Jaffa (Joppa), 32 miles south, lay a 40-mile stretch of inhospitable Mediterranean coastline without any natural haven for ships. Josephus describes how vessels on their way to Egypt “had to ride at anchor in the open, when menaced by the southwest wind; for even a moderate breeze from this quarter dashes the water to such a height against the cliffs that their reflux spread a wild commotion far out to sea.” Caesarea, built from scratch, provided such a haven.

The site Herod chose for his harbor had been a small village, probably built in the fourth century B.C., but by Herod’s time, it was dilapidated and in ruins. According to the limited literary sources that have survived, the little Hellenistic village was called Strato’s (Straton’s) Tower, after what may have been a prominent structure used by navigators. The Greek geographer Strabo reported a small ship’s landing at Strato’s Tower, but little else is known about it.

Herod, on the other hand, built on a grand scale. That is how he did everything. And at Caesarea, “as nowhere else,” Josephus tells us, “[Herod] displayed the innate grandeur of his character.”

The centerpiece of Caesarea was of course its harbor. Out from the shore for a distance of one-third of a mile, Herod built a great stone breakwater more than 200 feet wide. This breakwater, located on the southern side of the harbor, curved to the north at the seaward end and formed the major protection of the harbor against the storms out of the southwest. A smaller, less massive stone mole extended out 800 feet from the shore on the northern side of the harbor to a point only about 60 feet away from the return curve of the southern breakwater. This opening is thought to mark the location of the northern entrance into the harbor mentioned by Josephus. Both mole and breakwater have long since been destroyed by earthquake action, but their outline underwater against the white sand of the Mediterranean Sea bottom can be seen from an airplane overhead. Clearly visible is the opening that marks the northern harbor entrance.
In 1960, the Link Mission for Underwater Exploration excavated the remains of this ancient Herodian harbor and found that the area encircled by the two breakwaters was about 3½ acres. Josephus, with his customary eye for detail, tells us that the blocks of stone used to construct the breakwater were 50 feet long, 18 feet wide and 10 feet high; they had to be let down in water 120 feet deep. Lofty towers adorned the wall creating the mole.

“Numerous inlets in the wall provided landing places for mariners putting into the harbor, and the whole circular terrace fronting these channels provided a broad promenade for disembarking passengers … at the harbor mouth stood colossal statues, three on either side, standing on columns.”

The city itself matched the harbor. It was built largely of imported white marble, pursuant to a “magnificent plan” devised by Herod. The city took between 10 and 12 years to build and was
inaugurated in 13/12 B.C. The city included a palace, civil halls, an amphitheater, a hippodrome for athletic events, a system of aqueducts, warehouse vaults, sea-flushed sewers and a high defense wall surrounding the city. On a height facing the harbor Josephus described a temple dedicated to Rome and Augustus (Caesar Augustus). The temple was “remarkable for its beauty and grand proportions; it contained a colossal statue of the emperor, not inferior to the Olympian Zeus which served as its model.”

Students of near eastern archaeology are accustomed to finding ancient cities buried in tells, those flat top mounds with steep sides containing one city upon another in stratified layers. Most of these tells vary in size between 10 acres and 50 acres.

Caesarea is different. The visitor will find no easily observable tell. And the city itself is vast. The Herodian city contained about 164 acres. After Herod’s death, the city expanded far beyond the Herodian city wall. During the time of the pax Romana, a defense wall was no longer considered necessary to protect the city against invaders. Roman legions on the borders of the empire provided protection enough. As a result, the city spread out laterally along the coast and inland beyond the Herodian wall.

In the Byzantine period (seventh century) a defense wall was again built around the inner city. This was the defense wall of the city in 639/40 A.D. when Caesarea was conquered by the Moslems, but by that time Caesarea had already expanded about five miles along the coast and as much as two and one half miles inland.

The absence of a tell in the traditional sense does not mean, however, that there are no stratified remains at Caesarea. On the contrary, our excavations have uncovered nine different major strata in the city. Previous excavators have also uncovered a number of strata.

Herod died in 4 B.C. Shortly afterward, in 6 A.D., the Romans annexed Judea and chose Caesarea as the seat of the provincial Roman administration. Roman Procurators charged with the administration of taxation and with overseeing civil affairs of the province resided in, and governed from, Caesarea. The Roman Procurators established local courts in Caesarea and recruited detachments of auxiliary legionnaires from the local population. These troops were garrisoned and supplied at Caesarea. The mint of Caesarea under Roman license struck bronze coins to pay the troops. The coins were also widely used as exchange in the rapidly developing economy.

Except for a brief period (41–44 A.D.) when Herod Agrippa became a client king, like his grandfather Herod, and governed Judea from Jerusalem, the seat of government remained at Caesarea. It was from Caesarea that the province of Judea, later the province of Syria-Palestina, was governed without interruption for the next six centuries, that is, during the Roman and Byzantine Periods—until the Moslem conquest in 639/40 A.D.

Caesarea figures prominently in several events in The New Testament. In the book of Acts it is said that Philip, one of seven evangelists sent out of Jerusalem to preach in all the towns, completed his tour, and settled in Caesarea. His presence marks the first continuous leadership of the Christian community in Caesarea. His arrival may have occurred at the time when Pontius
Pilate was still Procurator. In Acts 10, Cornelius, a converted centurion in the Italian Cohort stationed at Caesarea, sent to Joppa for Peter. Peter responded to his call and then preached in Caesarea to a gathered community of relatives and friends in the house of Cornelius. This incident is the first recorded preaching of the gospel to the gentiles. Paul visited the Christian community at Caesarea after a sea voyage from Ephesus at the end of his second missionary journey (Acts 18:22). Later, Paul was arrested in Jerusalem and was sent to Caesarea for safekeeping. He was imprisoned for two years in Herod’s palace in the area reserved for the Procurator Felix. His case was heard by King Herod Agrippa. Paul, as a Roman citizen, appealed to Caesar in Rome and was sent there by ship from the Caesarea harbor (Acts 23–27). Little else is known of the development of the Christian church in Caesarea after that time until the early third century.

Caesarea was, however, the scene of some bloody preliminaries to the Roman destruction of Jerusalem in 70 A.D. At that time, Caesarea was a polyglot city of Jews, Christians, Samaritans, and gentiles, Greeks and Syrians, each group living in separate city districts. A disagreement between the Jews and Greeks over access to a synagogue in a gentile district of Caesarea led to open conflict and the subsequent desecration of the synagogue. Besides their frequent conflict with Roman subjects resident in Caesarea, Jews were often subject to Roman persecution.

The Jews found themselves increasingly at odds with their Roman rulers. Soon after the conflict over the desecration of the synagogue, word leaked out that soldiers of the Caesarea garrison, attempting to put down a Jewish insurrection in Jerusalem, had plundered the Temple treasury. The Jews of Caesarea attacked Roman troops garrisoned in the city. The troops responded, killing 20,000 Caesarea Jews. This atrocity catalyzed the First Jewish Revolt (66–70 A.D.), which ended in the Roman destruction of the Jerusalem Temple and the burning of the city. Vespasian, who directed the suppression of the revolt until he became emperor, made his headquarters and supply base at Caesarea. Titus, operating with supplies from Caesarea, completed the job left unfinished by Vespasian and after five months captured Jerusalem. Titus returned to Caesarea with Jewish captives. During the festivals and games held at Caesarea to celebrate his victory, 2,500 Jews lost their lives in gladiatorial sports in the Caesarea amphitheater.

Vespasian, in gratitude for the support Caesarea had given him in suppressing the Jewish revolt, granted the city the status of a Roman colony.

Sixty years later, a second Jewish revolt against Roman rule broke out. Again the Roman legions were supplied from Caesarea. This time, however, Jerusalem was leveled. On its remains, the limits of a new city were marked out by a plowed furrow and the name of the city was changed to Aelia Capitolina. The Tenth Roman Legion was then stationed on the site. With the complete destruction of Jerusalem, Caesarea’s place as chief city and capital of Palestine was secure. The governor of the Province of Judea was raised to senatorial rank and Caesarea became the capital of the Roman Province of Syria-Palestina.

Caesarea continued to grow in size, wealth and prestige during the second, third and fourth centuries. Prices were low, food was plentiful, gardens abounded, and public incense burners sent the aroma of spice floating on the evening air.
The Biblical theologian Origen (185–254) taught daily for 23 years at Caesarea. Here he established a major library and wrote extensively. His biographer said that in his lifetime Origen wrote 6,000 works. One of these was the Hexapla, a six-column comparative text of the Old Testament in fifty volumes. This early effort to arrive at a critical Biblical text widely influenced the early church, but unfortunately, apart from a few quotations, it is now lost. The church historian Eusebius (263–339), a friend and advisor of the emperor Constantine, also wrote extensively, utilizing the 30,000 volume library at Caesarea begun by Origen. When the Emperor Constantine ordered 50 Bibles to be copied for the new churches of the empire they were copied in the scriptorum at Caesarea. In the last years of his life Eusebius was bishop of the city in which he was born.

At about the same time that Origen first taught at Caesarea, Rabbi Hoshaya (d. 250) founded a school for the study of Judaism which produced a succession of outstanding rabbis including the famous Rabbi Abbahu.

After the fourth century, the literary record of Caesarea is almost nonexistent. In 614 A.D. the city was overrun by the Persians, and in 639/640 A.D. Caesarea was captured by the Moslem forces that conquered the whole of the middle east and north Africa. Cut off from the west and the long-established religious, commercial and intellectual contacts, Caesarea began a slow decline, becoming a village living in the remains of an ornate city.

Then the village became a quarry. The marble of its walls, the statues of its streets were burned for lime. The village residents were farmers who needed lime for crops rather than palaces and ornate decoration. The marble and the Aswan granite of Caesarea were mined to build cities elsewhere. In order to transport these huge stone and marble blocks, a ramp and shallow-draft wharf were built in the harbor—made from the magnificent Corinthian columns. They were laid three-deep by the hundreds in the silted harbor so that the heavy stones could be moved to the sea and shipped to Acco.

In 1251 A.D. the Crusaders built a fortified city at the harbor. The wall of that city remains a major Caesarea monument to this day.

In 1884 Moslem refugees from Bosnia established a colony on the remains of the Crusader city. Their mosque can still be seen inside the Crusader walls.

Before we began our excavations in 1971 a number of ancient structures were visible in addition to the fortress walls of the Crusader city and the mosque of the Bosnian refugees inside. Perhaps the most famous is the Caesarea aqueduct. It has been romantically portrayed on a hundred tourist brochures. Actually there are several aqueducts that supplied water to the city in various periods of its existence.
The most famous aqueduct, however, is the so-called high-level aqueduct which, as it approaches the city, is supported on a 6½-mile line of arches. This aqueduct, upon close examination, will be seen to consist of two aqueducts joined together side by side, both originating at a spring near the foot of the Carmel range northeast of the city. Since the spring water was not of sufficient volume to supply the two water channels, a search for additional water was made in the limestone foothills east of Mt. Carmel. About 10 miles due east of Caesarea, a farmer showed us a shaft 8 feet by 5 feet by about 33 feet deep, hewn at a steep angle into the side of the limestone hill. Down the shaft ran a series of steps and at the bottom of the shaft was a rock-hewn tunnel approximately 3½ feet by 4 feet which ran eastward from the bottom of the shaft. Pick marks on the sides of the tunnel ran in two directions, indicating that the tunnel was cut by teams working in both directions. On the walls are niches for oil lamps that lit the tunnel as work progressed. This tunnel, cut some 6 miles through the limestone of the hills east of Caesarea, taps a water collection point 10 miles east of the city and conducts that water along a circuitous but constantly declining channel until it joins the high level aqueduct on the side of Mt. Carmel. The aqueduct then carries the water another 6½ miles into the city. In short, Caesarea was supplied with an aqueduct nearly 13 miles long, half of which was a rock-hewn tunnel (for purposes of purity and security) and the other half of which was carried on a series of arches to the city.
A second aqueduct, the low-level aqueduct, has its source in a river 4½ miles north of the city. This aqueduct, dated by pottery taken from beneath its concrete foundation, was in use in the fifth century. The volume of water carried in each of the aqueducts has been calculated and indicates that in the fifth century the water demand of the growing city was about five times as much as it had been in the second century.

Experts agree that the high-level aqueduct is the older. Was the high-level aqueduct built by Herod? The difficulty in providing a definitive answer is illustrative of the difficulty encountered time and again in deciding what parts of the ancient remains at Caesarea were actually built by Herod and what parts were built later. The London-based Palestine Exploration Fund examined the high-level aqueduct in 1873 and attributed it to Herod himself, largely on the ground that Herod must have built an aqueduct to supply the city with water. Since then, several formal Latin inscriptions have been found on the western face of the western aqueduct that have led some scholars to date the structure to Hadrian’s reign (117 A.D.–138 A.D.). These inscriptions contain references to Roman legions that served in Caesarea at that time and according to one inscription “the Emperor Caesar Trianus Hadrianus Augustus made it.” The Latin word is *fecit*, which means make or build, and seems to refer to original construction rather than to a repair.
The fact that the high-level aqueduct consists of two distinctly different but adjacent aqueducts helps to solve the dating problem. Investigations by an Italian team in 1961 and by Abraham Negev of the Israeli Department of Antiquities in 1964 showed that the two channels of the high-level aqueduct were built independently. The eastern aqueduct was finished on both sides. Later the western one, the one toward the sea, was added, and was, according to the inscriptions, built by Hadrian. The eastern aqueduct was built earlier. It was probably built by Herod. In 1975, our excavation team made several attempts to date the eastern aqueduct by carefully digging beside it in an effort to find the trench in which the builders of the aqueduct would have laid the foundations of the arches. Unfortunately, we were unable to define the outline of the trenches or to recover any datable material.
However, our excavation team was able to locate the foundation and the foundation trench of another structure, the great defense wall built by Herod as part of his city plan. Beneath the wall and within the trench located 650 meters (one-third mile) north of the harbor, we uncovered pottery dating to the Herodian period.

Caesarea’s imposing theater, almost half a mile south of the harbor, is very likely Herodian. Josephus refers to a theater built by Herod. Today this theater still commands a magnificent view of the sea. How much of the existing structure is original and how much is reconstruction is difficult to tell.

The theater was completely uncovered by an Italian excavation team at Caesarea between 1959 and 1963. Clearly, it underwent extensive repairs and alterations during the 400 or 500 years when it was in use. The stage was renovated, vaulted entrances were added, and ornamental
capitals, lintels and cornices were built into existing architectural elements. It has now been restored and reconstructed, so that it can be, and is, used for concerts by the Israeli Philharmonic and other world-renowned orchestras, ensembles and soloists. In the Herodian period, Greek and Roman classics were probably performed here. The theater is approximately 300 feet in diameter and accommodates about 4,000 people.

Finds from the theater excavation included a magnificent, many-breasted statue of Diana of Ephesus. But the most sensational find uncovered by the Italians in the course of their theater excavation was an inscription. In the theater steps a stone was found containing a Latin inscription naming “Pontius Pilate, Prefect of Judea.” The inscription was originally a dedicatory plaque for Tiberieum Pilate built. A Tiberieum was a structure—probably a temple or shrine—honoring the Emperor Tiberius. After the Tiberieum fell into disuse, the dedicatory plaque was used to repair one of the steps of the theater. This inscription is the only known lithic inscription referring to Pontius Pilate. It reads as follows: “Pontius Pilate, the Prefect of Judea, has dedicated to the people of Caesarea a temple in honor of Tiberius.”
The hippodrome, used primarily for chariot racing, lies east of the harbor. It has been dated to the second century on the basis of the coins found in the earliest of five sand tracks in the area of the hippodrome. From the beginning, however, Caesarea was a center of sporting events in the Mediterranean world. Much of this activity—gymnastic exercises, boxing and wrestling matches—may have occurred in another structure, the amphitheater. The outline of this oval amphitheater, still unexcavated, can be seen from the air in the northeast section of the city. The huge hippodrome was approximately 1,500 feet long and over 250 feet wide and could seat as many as 38,000 people. Among the remains of the hippodrome are several Aswan granite metae or turning posts for the chariot races. An obelisk stood in the center of the field. Three large pieces of this obelisk now lie broken in the hippodrome. The obelisk, like the metae, was made of Aswan granite imported from 600 miles up the Nile River in Egypt. The obelisk may have stood as high as 72 feet.

Both a synagogue and the remains of several churches have been uncovered, evidence of the polyglot nature of the Caesarea population. The synagogue is located north of the wall enclosing the Crusader city and overlooks the sea. Like many structures at Caesarea, it was built and rebuilt several times. It was first built in the fourth century A.D., and was used until about the middle of that century. In the middle of the fifth century a new synagogue was built on the ruins. In the ruins of these buildings, excavators found mosaics, inscriptions, columns, and a hoard of 3,700 bronze coins from the mid-fourth century. A menorah, the seven-branched candelabrum, was found carved on a marble plaque as well as on the capitals of the columns. Several mold-made oil lamps bearing menorahs were also uncovered. A mosaic inscription contained a reference to the archisynagogus, an official like today’s synagogue president. This inscription also mentions a triclinium, or Roman-style dining room that once was probably part of the synagogue.

Below the fourth-century synagogue was a square building that had originally been constructed as a residence. Herodian lamps, spindle-shaped bottles and so-called pseudo-Nabatean pottery suggested to excavators from the Israeli Department of Antiquities that the structure was of the
Herodian period. Some of the walls of this building had been incorporated into the fourth century synagogue. The excavators accordingly concluded that the Herodian residence had at an early stage been converted into a synagogue and served thereafter as a house-synagogue. This house-synagogue may have been the famous “Synagogue of the Revolt,” as it is referred to in the Talmud, the center of the conflict described above that sparked the First Jewish Revolt against Rome (66 A.D.–70 A.D.)

Apart from the cathedral remains in the Crusader city and the so-called roofless church found northeast of the Byzantine defense walls, no church structure has been archaeologically defined at Caesarea. Our own expedition has uncovered fragments of two chancel screens from churches and a 2½-foot-long by 6-foot-high fresco of an assembly of 13 saints in a vault. But we have not found a structure we can demonstrate to be a church building.

The most prominent monument at the site, however, is the massive Crusader enceinte which enclosed Crusader Caesarea. Originally it enclosed the city on four sides, but on the seashore it has been almost completely washed away by erosion. While the Crusader ruins contain structures that date from early in the Crusades, the prominent visible remains today—the moat, escarpment, citadel and walls containing some sixteen towers—date from 1251 when King Louis IX of France spent a full year restoring the fortifications at Caesarea, the King himself assisting in the actual building.

Our excavations at Caesarea began in 1971 and are still continuing. They are slow and painstaking, involve hundreds of volunteers and staff each year, and have barely scratched the surface, so to speak. This must therefore be considered a very preliminary report. Like previous investigators, we found remains from many periods.

Dramatic evidence for the varied religious character of Caesarea in the third century A.D. was uncovered on one occasion when we confidently expected to be excavating authentic Herodian construction. We were excavating south of the Crusader enceinte in a building near the sea, trying to understand the wall structure of a third-century building, when we hit a floor level consisting of a thick layer of hydraulic concrete, a waterproof cement. On top of the hydraulic concrete were four-inch-high limestone blocks set at regular intervals that served as supports for thick ceramic roof tiles. Traces of marble indicated that the tiles had once been covered with white marble sheets so that an elaborate marble floor 60 feet long and 15 feet wide covered the area. A series of columns too short to be roof-bearing columns was found on the remains of the floor. The columns bore inscriptions honoring hitherto unknown procurators of the third century A.D. On some were signs that they were once topped by sculpture. They seem to have been ranged along the sides of this structure. The evidence of the elaborate marble floor, columns, sculpture and inscriptions led us to name this structure the “Honorific Portico.”

Under the marble floor in the Honorific Portico was an elaborate but puzzling drain. There is an aphorism among Near Eastern archaeologists which counsels, “The answer lies below.” We decided to follow this advice in the hope of better understanding the drain and the Honorific Portico. Within a few hours we exposed a large barrel vault made of sandstone blocks. The vault was originally 96 feet long, 16½ feet wide, and 15 feet high, and oriented east and west. The huge vaulted room was two thirds filled with sand. Although the roof of the vault took only a
It turned out to have been built, as we expected, as a warehouse for the Herodian harbor. The lowest courses of the vault rested on bedrock. We found embedded in the lowest floor level, which also rested on bedrock, huge quantities of amphorae fragments. Sometimes enough of a single one of these large storage jars was found so that it could be reconstructed. The amphorae dated to the first century and were typical of those used in trading vessels from Gaul, Italy, Spain and elsewhere in the western Mediterranean.

Some of the amphora handles had stamps impressed in them indicating that they had once contained *garum*, a kind of fish sauce. We also found coins in the beaten earth floor—dating from the time of Nero (54–68 A.D.) and probably minted at Caesarea. Clearly, we had uncovered a warehouse that had had heavy use in the first century A.D. and because it is part of a large complex of similar warehouses it can safely be called part of Herod’s massive harbor installation.

Contiguous to this vault on the south side was another similar vault and beside these there were other vaults. These vaults were so filled with debris that exploration was hindered for lack of crawl space, as well as lack of oxygen and light. However, we did manage to measure 10 of the
estimated 20 vaults in this block of vaults. We now believe that there are as many as five such blocks of vaults along the harbor front.

Seven of the western vaults in this block opened onto a paved road 18 feet wide that ran along the shore. Six other vaults opened onto roads that ran inland and later, as we shall see, helped us to understand the street system of Herodian Caesarea. Another seven vaults faced eastward and opened onto a road that was probably the main street of Caesarea, known in Caesarea as in other Roman towns, as the Cardo Maximus. Obviously these vaults constituted a huge warehouse complex and shipping installation dating from Herodian Caesarea.

This huge warehouse complex and the amphorae filled with goods bound for Italy and Spain are evidence that Caesarea was indeed a harbor rivaling Piraeus, an eastern terminus for traffic between the Mediterranean, Damascus, Arabia and beyond. The income from this trade, coupled with that derived from sea traffic calling at Caesarea on its way between Egypt and the northern Mediterranean coastal cities must have been enormous. Here we have an explanation for the source of the vast revenues Herod needed to finance his extensive building programs. Even though Herod taxed his subjects severely, the tax return from four million subjects living on what was primarily an agrarian economy could hardly account for the huge sums Herod used and gave away during his reign. Herod’s lavish building activity was not confined to his own kingdom, where he built at least three cities, including Caesarea, a network of fortresses and palaces that ringed the kingdom of Judaea, as well as the Temple that stood resplendent in the center of it all at Jerusalem. His largesse extended to cities and colonies both east and west of Caesarea. He gave to Damascus a theater and a gymnasium; to Ashkelon, baths; to Tyre, a colonnade and fountains; to Beirut, temples and market places; to Laodica, an aqueduct; to Antioch, a colonnaded street; to Rhodes, a Pythian temple; and gifts to Cos, Samos, Pergamum and other cities, some as far away as Athens.

But let us return to the first storage vault we uncovered, the one under the Honorific Portico, that we completely excavated over a two-year period. The reader may be wondering how this vault evidenced the polyglot character of third century Caesarea, as I earlier indicated. The fact is that the vaulted building had been built as a warehouse in the Herodian period, but it had been turned into a Mithraeum in the third century A.D. The walls of this vault had been plastered and were at one time completely covered with elaborate frescoes from the life of Mithra. The ceiling was painted blue. Beside the altar at the end of the vault were three scenes from the life of Mithra. Unfortunately, the frescoes were in a very poor state of preservation. When the old warehouse vault was converted into a Mithraeum, stone benches were added along the side walls and an altar was built at one end of the vault. Both the benches and altar were covered with plaster.
Behind the altar we found a very well-preserved white marble medallion; its upper segment shows Mithra slaying the sacred bull. This beautiful medallion was one indication that the warehouse had been converted into a Mithraeum and was a big factor in its identification.

The vault had been converted into a Mithraeum at the same time the Honorific Portico had been built above it—this helped to explain both that building and the elaborate drain that had so puzzled us. The drain was intended to protect the frescoes in the Mithraeum from water from above that would otherwise leach through the voussoir of the vault.

Now, in light of the Mithraeum, we better understood the building above it. As the Mithraeum was excavated we noted an opening near the eastern end of the vault’s ceiling. This opening was offset from the vault’s center line and admitted a shaft of sunlight into the vault. As we were digging we observed that the shaft of light admitted to the vault by this opening transcribed an arc during the course of each day. And each day the arc of light moved closer to the altar at the end of the vault. Just after noon on June 21, the summer solstice, the shaft of light had progressed to the altar, illuminating it with a blaze of light. The opening in the ceiling had been purposely and precisely placed and was known to the builders and users of the Honorific Portico above.
Since the inscriptions in the Honorific Portico all honor military personnel we believe that the Mithraeum was a military Mithraeum for the use of the Roman legionnaires. More than 800 Mithraea are known; the vast majority, however, have been found in Europe and North Africa, in places where the Roman legions were stationed. Only about 30 Mithraea have been found in Asia. The Mithraeum at Caesarea is the only one ever found in Israel.

Even though many Mithraea have been discovered, little is known about the Mithraic cult, liturgy or beliefs. It is apparent, however, that Mithra was a savior god who brought a new order of life to his followers. Mithra was an ancient deity of light and truth mentioned in Persian and Indian literature. In the first century after the turn of the era, the worship of Mithra became popular among the Roman military troops. Graded membership in the cult was obtained through rigorous initiation rites. Membership was secret and was confined to males. Adherents professed and practiced a high moral code. By the third century, Mithraism was so popular that it was a rival to Christianity, but by the fourth century, it began to wane.

In this article we can only briefly touch upon the extensive Late Roman and Byzantine structures uncovered at Caesarea, such as the Honorific Portico and the Mithraeum. These, and a wide variety of other structures, went out of use sometime before the fifth century. A patterned mosaic, almost two acres in area, was laid over their remains to form a courtyard almost a city block wide. It was contemporary with the last phases of the Archive Building. At the eastern end of this courtyard, above the vaults and overlooking the sea, a series of grand Byzantine buildings was constructed. Their purpose is still unknown to us, but something of their quality can be seen in the marvelous mosaics found on their floors. One floor originally was decorated with four portraits, the first figural mosaics found at Caesarea. Each of these magnificent portraits represented a season of the year, and two, winter and spring, have been preserved.

From the beginning, we knew that one thing we wanted to discover was the street plan of Herodian Caesarea. If Caesarea was built like other Roman cities of its day, it was laid out in squares with parallel streets running both east-west and north-south. The major north-south axis was called the Cardo Maximus or simply Cardo. The Cardo and the other parallel north-south streets would have regularly intersected the east-west cross streets, each of which was called a *decumanus*. 
In the hope of getting at least some clues to the Herodian street plan, very early in our excavation we decided to dig under several unusual sand dunes. South of the 13th century Crusader city near the sea’s edge are four large sand dunes and a broad stretch of level sand east of the dunes. Each of the four elongated dunes is about 250 feet long; each lies on a north-south line; and each is approximately equidistant from the one adjacent. The dunes rise 60 feet above the sea and 25 feet above the fields immediately to the east. From old photographs and from even earlier drawings, we learned that these dunes have been in this location and in approximately the same configuration for centuries.

Dunes normally move at a predictable rate. Stable dunes like these must contain some kind of anchor inside that holds them in place. The size and stability of the Caesarea dunes suggested that they were being held in place by the remains of major port or port-related installations.

In 1960 Abraham Negev of Hebrew University had conducted soundings in this area that indicated that a complex of buildings lay buried here, some buildings within the dunes. According to Professor Negev, the buildings were in use during the Byzantine period (fourth to seventh centuries). In one building Professor Negev found a mosaic containing an inscription from the New Testament—Romans 13:3: “If you would not fear the authority, then do good.”

We decided we would try to excavate this entire building. This excavation gave us our first clue to the location of the Cardo. The Cardo was from the Byzantine period—but because Caesarea’s growth had been uninterrupted we hypothesized that the Byzantine city still followed the street plan of Herod. Under the Byzantine street we hope to find the Roman street and under that the Herodian street.

But first the building. Initially we called it simply Structure I. Later we named it the Archive Building because mosaic inscriptions indicated that the municipal archives of Caesarea during the Byzantine period were housed here. The building was probably part of a municipal center or perhaps even part of the governor’s complex.

The building was 60 feet long and 48 feet wide. It contained eight rooms. Three of the rooms were on each side of a large central hall oriented east/west. The entrance to the central hall was in the east. At the end of the central hall was the eighth room. Almost every room in the building contained a mosaic inscription.
The building had been destroyed in the Islamic conquest of Caesarea in 639/640 A.D. A thin ash layer in an earlier stratum indicated that the building had probably also been burned when the Persians conquered the city in 614 A.D. The general plan of the building had been established in the third or fourth century. In the intervening period there were a number of rebuilds and modifications, although the basic outline remained the same.

One mosaic floor was laid upon the previous one, and we were able to identify three different mosaic floors. The uppermost was laid sometime in the late fifth or early sixth century A.D. Beneath this floor was another mosaic floor. Under the second floor we found pottery indicating that the second mosaic floor was constructed at the beginning of the Byzantine period in the fourth or fifth century. A third mosaic floor has been dated on very minimal evidence to the third or fourth century.

I already mentioned one inscription—from Romans 13:3—found in the northeast corner of the building. In the central hall of the building a heavy calcium deposit partly obscured another inscription. When we scraped off the calcium deposit with the help of some hydrochloric acid, we found a mosaic medallion 28 inches in diameter containing a five-line inscription which, like all the others, was in Greek. It read, “Christ, help Marinus the President and Ampelios and Musonius.”

In one of the southern rooms we discovered a multicolored mosaic medallion containing an inscription which was a longer version of the Romans 13:3 inscription already found: “If you would not fear the authority then do good and you will receive praise.” A small encircled cross surmounts the inscription.

In yet another room, at the doorway, was an inscription reading: “Peace be upon your entrance and your exit.” This inscription is in a tabula ansata (a rectangle containing an inscription, with a triangle on each side pointing to the inscription).

The largest inscription was found in a room at the western end of the central hall. It reads, in four lines, “Christ, Help Ampelios, the keeper of the archives and Musonius, the financial secretary [or accountant], and the other archivists of the same depository.” On the basis of this inscription, we called the structure “The Archive Building.” The inscriptions in a central location admonishing recognition of the governing authority also suggest this was a municipal or governmental edifice. A fragmentary inscription on a sandstone bench found in one of the rooms contains only two words “break” and “laws,” further support for the theory that the building served a government function. Lead seals of a type attached to books and codices during the Byzantine period have also been found in the area. Today’s Caesarea residents tell us that during a road clearing operation beside the Crusader City many more of these seals were found. Five such seals said to come from this road clearing are now in the museum of Kibbutz Sdot Yam, just south of Caesarea. For all of these reasons we feel justified in naming the structure the Archive Building and in identifying it with a municipal function.

All of the inscriptions I have described are from the uppermost mosaic floor. We have investigated the two lower mosaic floors only in limited areas where the upper floor was already broken or did not contain either a design or an inscription.
Even from this limited investigation, it appears that these lower mosaic floors also contain inscriptions. However, their contents will not be discernable until we remove the later mosaics that still cover the earlier floors.

The main entrance to the Archive Building was to the east. The back of the building was toward the Mediterranean. Outside the main entrance to the building a previous investigator had uncovered part of a patterned mosaic 18 feet wide. While we were examining the eastern edge of this mosaic we uncovered a three-foot-wide stylobate, that is, a continuous base for a row of columns. On top of the stylobate were found in situ white marble column bases, spaced about ten feet apart. At first it was thought that the column bases and the mosaic were part of a portico in front of the Archive Building. This initial conclusion was supported by the subsequent discovery that beneath the 18-foot-wide mosaic were two additional mosaic surfaces, and that the dates of the three mosaic surfaces corresponded to the dates of the three mosaic floors found inside the Archive Building. Subsequent excavation, however, proved that we were wrong in concluding that this was a portico of the Archive Building.

Beyond (east of) the stylobate, we found a street, also 18 feet wide, paved with heavy limestone pavers laid in a herringbone pattern. On the other side of this street but at a location south of the Archive Building we found another stylobate of similar size, shape and construction as the first. East of the second stylobate we found evidence for another mosaic pavement, although we do not yet know its exact width.

What we had thought was a portico of the Archive Building was in fact part of a major north-south city street. This thoroughfare consisted of an open vehicular street built of limestone pavers, on either side of which was a line of marble columns. Beside each row of columns was a patterned mosaic sidewalk 18 feet wide, the same width as the open street. Both the street and the two mosaic sidewalks appeared to extend south for one third of a mile precisely to the exit of the Herodian theater. Our excavations uncovered not only the column bases still on the stylobates, but also some of the fallen column shafts beside the bases and fragments of Corinthian capitals. We also found some of the roof tiles that served as part of the covering for the sidewalks on either side of the open street. Here, obviously was, the grand concourse of Caesarea—the Cardo Maximus.
But in all three phases this street dated to the Byzantine period or the late Roman period at the earliest.

When we projected the northern continuation of the Cardo on our plan, we discovered that it ended in what was probably the Roman forum in the center of the city, now under the Crusader fortress. More important, the Cardo, on its way to the Herodian theater exit, follows the line formed by the eastern end of the blocks of Herodian vaults mentioned above. Thus, the Roman and Byzantine Cardo fits the city street plan determined by the regular block pattern of Herod’s warehouses. This seems to indicate that the Herodian street followed the same line as the one we have been excavating. But until now we have found no trace of a street we can call the Herodian Cardo or even of an early Roman Cardo underneath the layers of the Byzantine Cardo. We have not given up the search, however. Thus far, we have examined this thoroughfare at three different points along its projected course and found the Cardo there under 12 feet of overburden, frequently repaired, partly destroyed, often robbed out—but there.

In the center of the paved street we found drain openings, actually manholes, some of which went down ten feet. At the bottom was an arched layer of brick covering the elaborate sewer system of ancient Caesarea. So far we have explored only one vault of this sewer system, which was ten feet wide and just as high. Unfortunately almost all of the sewers have been blocked by debris and by the remains of later sewers built inside the older ones.
The original sewers were probably Herodian, lending further support to the suggestion that the street above marks the line of the original Herodian street. City planning in Roman times called for sewers to be placed under streets rather than under buildings. Josephus tells us that half the time spent constructing Herodian Caesarea was devoted to putting sewers under the city and that these were flushed by the sea. He relates that “some [of the sewers] led at equal distances from one another to the harbor and the sea, while one diagonal passage connected all of them, so that rainwater and refuse of the inhabitants were easily carried off.” (Jewish Antiquities XV:340). Thus far in the excavations at Caesarea we have cleared one huge sewer, 10½ feet high. This sewer tunnel opens toward the sea. It is uncertain as yet how these sewers were flushed by the sea because the tides along the Mediterranean shore are not high enough to provide that action.

One possible explanation is that the “diagonal passage” referred to by Josephus, may have flushed out all the parallel sewers under the streets by means of sea water diverted into it. Eight hundred meters south of the center of Caesarea we have located a mole or breakwater positioned in the sea counter to the current. Perhaps this mole diverted seawater into a sewer opening—still undiscovered—at the seaward end of the diagonal passage. If so—this water would have continuously flowed into and cleaned the sewers beneath the streets of the city. In future seasons, we hope to explore the Caesarea sewer system more extensively.

We also discovered several of the cross streets that run perpendicular to Caesarea’s Cardo Maximus. Each cross street is called a decumanus (plural: decumani). To describe this discovery and to understand our eventual projection of the Herodian street plan we must go back to the Herodian vaults or warehouses. While all the vaults could not be examined, we were able to determine that they were built on bedrock in blocks of 20. This 20 vault unit, we speculated, was the size of the original city block of structures. Four, and perhaps five, of these blocks line the shore from the crusader fortress to Herod’s theater. We dug probes where we projected spaces between the blocks of vaults. In each case we found a cross street or decumanus from the late Roman period. Since these streets were built on top of an earlier Herodian street, we have been able in this case to lay out Herod’s city plan in this area of Caesarea. And so, gradually, with the aid of the trowel and sometimes even of the teaspoon, a picture of Herod’s city has begun to emerge.