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Cover: This is a portrait of Abou al-Kassem Khalaf ben Abbas al-Zahrawi, the 11th-century physician who laid the foundations of European surgery. But it is not a portrait that will ever grace a private art collection or adorn a museum wall. It appears on a 1964 Syrian postage stamp issued in honor of the Fourth Arab Congress of Dental and Oral Surgery. Enlarged 120 times its original size (see back cover) to emphasize the quality of the engraving, it suggests the excellent but usually unnoticed painting, photography, drawing and engraving that go into the millions of illustrations used annually on Middle East postage stamps.

ISLAND OF STEEL

BY WILLIAM TRACY

The man standing on the beach near Ras Tanura thought he was seeing things. He knew he was in Saudi Arabia and he could observe, behind him, the towers and stacks marking the Ras Tanura refinery of the Arabian American Oil Company (Aramco). But in front of him, rearing out of the sea two miles offshore, was an enormous island of steel that he could have sworn hadn't been there the day before.

He was right, of course. The island—actually a sea-going barge with enormous "legs" drawn up above its deck—*hadn't* been there before. During the night it had been towed into place by a single tug on the last phase of a long voyage from England and the first phase of an imaginative construction project to provide deep-water berths for the world's new mammoth oil tankers.

Twenty years ago, when the Ras Tanura refinery went "on stream," a 1,200-foot T-shaped pier at the end of a trestle and causeway poking 2,300 feet into the Arabian Gulf could easily accommodate four tankers of the size then considered standard. But as the postwar demand for petroleum rose so did the size of tankers. Soon a second pier, this one extending out 3,600 feet, was added so that berths in water 42 to 48 feet deep could be made available. But the tankers continued to grow at such a pace that the North Pier had to be extended twice, once in 1959 and again in 1964, the year when a record 404,102,618 barrels of oil (60 per cent of all Aramco's crude oil) were exported through Ras Tanura. Eventually the "T" of the North Pier stretched 2,200 feet, and provided berths for six tankers. At the same time,

PHOTOGRAPHY BY ABDUL LATIF YUSIF, SAID AL-GHAMIDI AND BURNETT H. MOODY

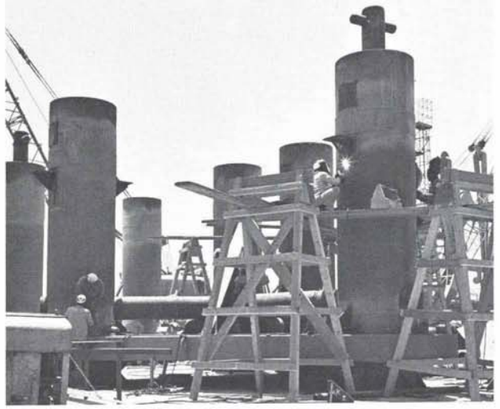
Some of the equipment assembled on Bahrain for Sea Island One, included seven Chiksan loading arms, an operator's control tower and two floodlight towers.

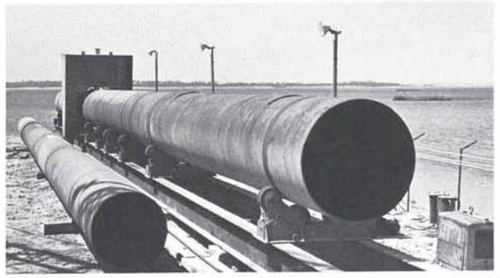
pumps, pipelines, storage facilities and loading arms were being continually added to both piers or improved to shorten the costly in-port or turn-around time of the ships, to enable maximum use of the 10 berths available at the two piers, and to increase safety.

But even those measures barely kept up with the spectacular increases in ship sizes of the world tanker fleet, which frequently forced Aramco to handle tankers on the kind of schedule which would be timed to complete loading at high tide so that there would be sufficient water depth to keep the ship afloat. It became evident that tankers were being built that could never be loaded at the North Pier because of their deep draft.

As far back as 1957, when the capacity of the terminal at Ras Tanura was rated at 750,000 barrels per day of crude oil and 180,000 barrels of refined products, Aramco had retained a New York firm of consulting engineers to prepare a master plan for the port. The study considered the advantages and drawbacks of buoy berths (cheap to build individually but expensive in use because of the number of them required, the long pipelines needed to connect them to the shore, and the time which would be lost because of weather and darkness), finger piers, T- and L-head piers (most expensive because of the long trestles required to reach deep water) and two-or-more-berth sea islands. But whatever you decide, the consultants

At the DeLong-Hersent-Kanoo Shipyard on Bahrain welders put finishing touches on top structure of one of eight breasting dolphins manufactured for Sea Island No. One.





Once underway, work on the huge mooring dolphins, upper left, the 60-feet-long legs, lower left, and the Chiksan loading arms moved swiftly to completion.

told Aramco, keep in mind that by 1980 there will be a need for berths handling tankers that will be 1,200 feet long and draw 60 feet of water.

When the time came for expansion to handle Aramco's steadily increasing oil production it was decided to build a $9,150,000 "sea island" big enough to accommodate anything the shipyards of the world were either constructing or planning. It was to be designed, of course, for maximum efficiency in loading and would berth two tankers simultaneously. In one stroke it would raise the nominal capacity of crude oil shipments from the port by 500,000 barrels daily.

Once the major decision was taken, Aramco quickly implemented it with specific details. The island would be located 1¾ miles northeast of the existing North Pier in 85 feet of water. It would consist of a central loading platform—the enormous island that had surprised the man on shore—sitting on four legs, each six feet in diameter and each to be driven 10 feet into the bottom of the Gulf. There would be 12 dolphins, sturdy steel towers or platforms set on piles driven into the floor of the sea and connected to the central platform by 1,000 feet of six-foot-wide walkways. The four "breasting" dolphins at each side would be placed slightly outside the central platform to bear the full weight of a ship breasting them at berth. Four "mooring" dolphins, two at each side of the complex, would support the lines and mooring cables of the ship and hold it in place against the breasting dolphins. Next to the southernmost mooring dolphin, pontoon sections would tie in to form a 50-by-50-foot small-craft landing. The length of the entire loading complex, from one outer mooring dolphin to the other, was to be 1,250 feet.

With plans made, construction could and did start. And on September 23, 1964, at high tide, British newsmen and television cameramen covered the unusual sideways launching of a huge barge at the Cleland Shipbuilding Company's yards at Wallsend, near Newcastle upon Tyne.

From England it was towed across the North Sea to Rotterdam in the Netherlands, where its deck was loaded with construction materials for the long haul to come. In mid-January it started the two-month trip through the North Atlantic, past Gibraltar, across the length of the Mediterranean to Port Said, through the Suez Canal, down the Red Sea, around the blunt tip of the Arabian Peninsula and up into the Arabian Gulf to Bahrain Island.

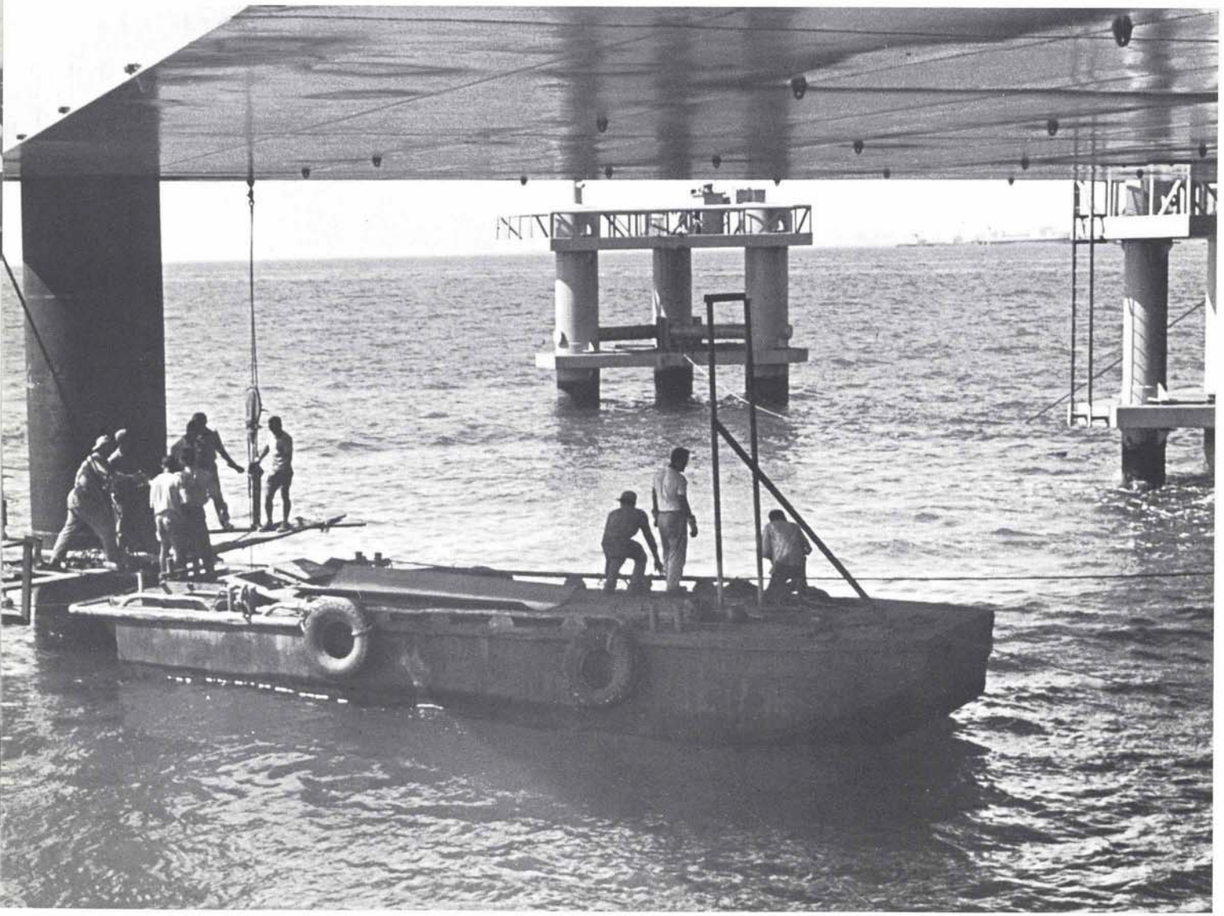
In Bahrain—at the DeLong-Hersent-Kanoo yards in Manama—the barge began its metamorphosis from a mere cargo hauler to the oil-loading platform that was to become the major portion of the sea island, with the Saudi Arab firm of Yusif bin Ahmed Kanoo of Dammam and two international contractors working on the project.

At Ras Tanura, pile driving started at the deep-water site in June, 1964. Steel components for the project —weighing 800 tons in all—were being fabricated on Bahrain. To stand up to the sea and hold the supertankers which would tie up alongside, the heavy-duty dolphins had to be extremely strong as well as flexible. The pilings, 46 in all, were driven into the sea bed 28 to 38 feet. Clusters of these pilings, topped by 20-foot-wide platforms, make up the dolphins, the eight breasting dolphins weighing 40 to 50 tons and the four massive mooring dolphins,

100 tons each. The water's depth, plus the lengths that would be buried in the sea floor and protrude above the waves, demanded piles up to 150 feet long, so even with 32- and 55-inch diameters they are bound to have some "give." In fact, the platforms were designed deliberately for a normal sway of 21 inches (much as the Empire State Building in New York City is meant to rock a little in a high wind) but could, in case of a carelessly heavy nudge from a berthing tanker, bear up to a six-foot deflection.

Its legs towering overhead, the converted barge was towed into the roadstead off Ras Tanura in the darkness of morning on August 26th, after a 16½-hour trip from Bahrain. Six of the 12 dolphins were already in place. After a 13-hour wait for slack tide, the floating platform was jockeyed into position with the help of a pile-driving barge in only 45 minutes. Then, cautiously, over a three-hour period, the thick legs were jacked pneumatically down into the depths and driven into the bottom of the Gulf. Once they were embedded, the platform continued climbing up on them until its deck reached a level 28 feet above low-tide mark. What was left of the pilings was sheared off flush with the deck, while 10 feet of Monel sheeting was welded around the platform like a skirt to protect the splash zone. What had left England as a barge had been transformed into a man-made island, set permanently on the floor of the Arabian Gulf two miles off the Ras Tanura cape. In a few months the first high-floating tanker would tie up to the mooring dolphins and begin to settle into the water with its heavy cargo of crude oil from one of the prolific fields of Saudi Arabia.

The central loading platform of the "island" measures 80 by 120 feet and in what was the former hold are engines, transformer and switchgear rooms, the slops pump and tanks, cathodic protection rectifiers (to reduce electrically corrosion of the pilings) and tanks for drinking water and fire-fighting foam. Topside, a prefabricated aluminum



The central loading platform, on site off Ras Tanura, was raised to 28 feet above mean low-water level after its legs had been lowered to the Gulf floor.

deckhouse containing a control room, pilots' office and laboratory is located at one end. On deck also are fully air-conditioned crew's quarters with a galley, dining space and bunks, although the men will usually sleep on the platform only when weathered in. Besides this accommodation and the maze of manifold crude and bunker lines, a 60- and a 40-foot crane (handling five and 10 tons, respectively), two floodlight towers (one supporting the shade for a prayer shelter) and four 10-man inflatable rafts are squeezed onto the crowded deck.

Two Chiksan loading stations, the heart of the platform functionally speaking, complete the layout. One serves each side. Each station has three 16-inch delivery arms through which can be pumped a maximum 75,000 barrels of crude oil per hour, and a smaller bunker arm to fuel the ship. These hydraulically-operated marine loading arms are flexible enough to compensate for the difference in high and low freeboard of the vessel (a ship settles as much as 38 feet as its tanks are filled with oil), as well as the normal movement of sea swells and the eight-foot range of the tide. A Chiksan operator will likely have to develop "sea legs" much as a sailor does on his first voyage. Standing in his control tower 36 feet above the deck, over 150 feet above the sea bottom, he feels the minute sway of the platform magnified enough to make a landlubber's head swim.

Long before the floating island was anchored between its breasting dolphins, work had also commenced on the submarine oil pipelines which would feed its loading arms from the huge aluminum-painted tanks on the beach. By late September the four parallel lines were there, waiting to be connected, settling gently into the mud on the bottom of the Gulf, their temporarily sealed ends resting clear on a 40-by-50-foot steel and timber frame 14 fathoms below the island site. From a point on shore near the North Pier trestle, the lines stretch about 12,000 feet into deep water, curving smoothly over a 3,000-foot radius to the "mud mat." The three large-diameter crude lines, 30 inches across, increase to 32 inches midway to the site and back down to 30 inches before reaching the mat. The smaller bunker line has pipe of 20- and 22-inch diameters. This two-inch difference in size in both types allowed the spiral-welded pipes to be "nested" one inside the other while in transit from Japan, a cost-saving shipping technique which was pioneered in the mammoth Trans-Arabian Pipe Line project two decades ago. Once in Saudi Arabia, a Fiberglas and asphalted felt protective wrapping and a cement coating (to add weight so that the pipe would lie firmly on the sea floor) were applied at the Dammam pipeyard of a Saudi Arab contractor. The actual laying of the pipe was managed by an international contractor with offshore experience in Aramco's Safaniya field.

Later, submarine power and communication cables joined the lines on the sea bed. Riser supports to carry the pipes to the surface were built after the central loading platform was in place while the remaining six dolphins

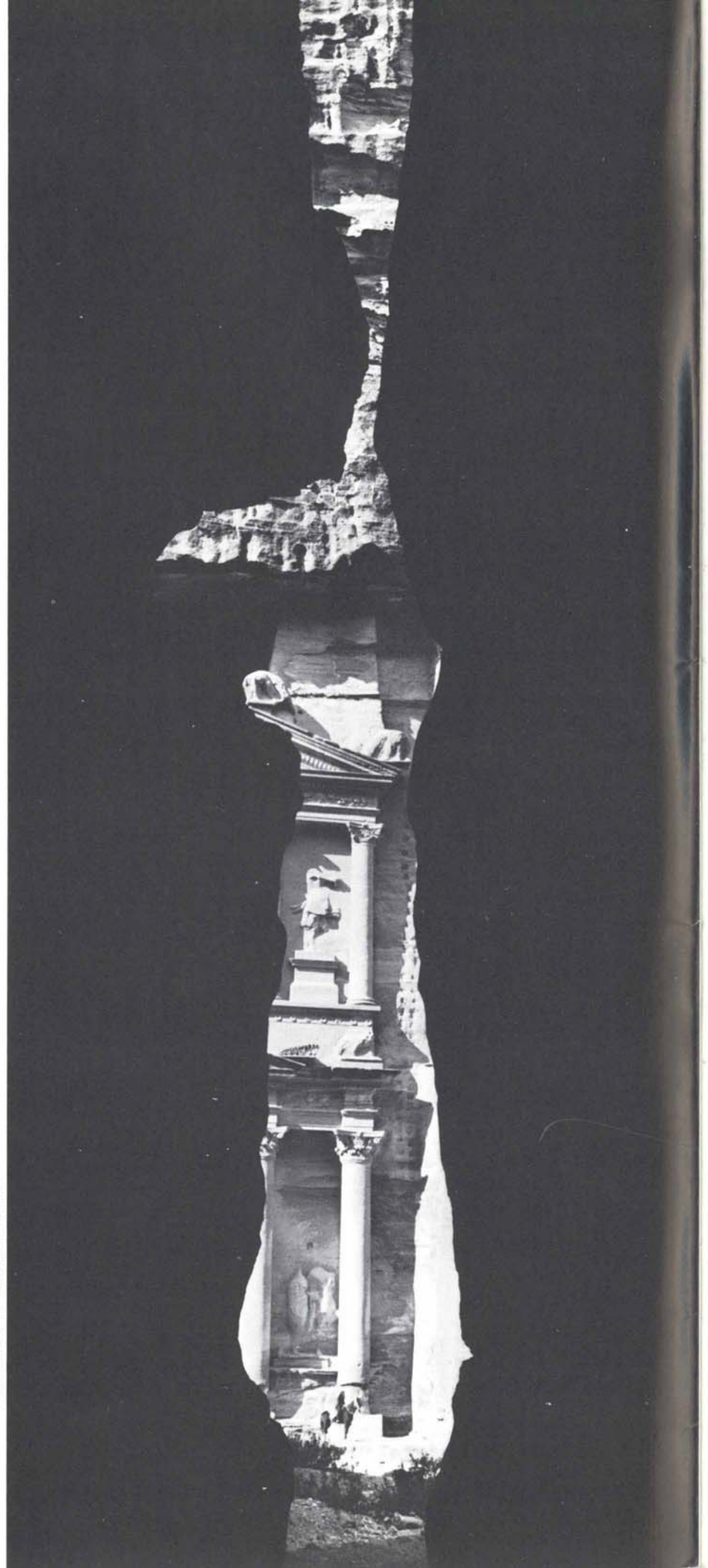
Tugs, barge and cargo in Suez Canal en route from Rotterdam to Bahrain.

were completed. Onshore a new pump house (the largest in the Ras Tanura Terminal, with 2,875-horsepower motors), a high-rate crude blender and additioned tankage are being constructed as part of the terminal expansion.

The story of the construction of *Sea Island No. 1* came to an end early this year when the supertanker *Tokyo Maru* docked there and took on the first cargo. But that was only one more step in the development of Ras Tanura port as a whole. Already approval had been granted for a new phase of the project—berths three and four on a second sea island complex, 1,400 feet long, which will cost $7,000,000. A third island, with berths five and six, is also being considered as part of Aramco's expansion program. In anticipation, the northernmost mooring dolphin on the first island was built with extra specifications, and will serve as the southern dolphin for *Sea Island No. 2*. Eventually, a chain of islands will stretch into the Gulf in the straight line—bearing 356°—best adapted to the tides and currents off the cape.

Constant technological breakthroughs force the company's planners to keep on their toes. *Sea Island No. 2*, scheduled to go on stream in 1967, is designed to handle the 200,000-deadweight-ton tankers which were not predicted for construction, by 1957 engineering standards, until 1980. But it's none too soon. A 193,000-deadweight-ton giant is nearing completion in Japan right now, 15 years earlier than forecasted. And if bigger tankers are built, it's a safe bet that Aramco's new sea islands will be ready when they call.

William Tracy is a free-lance writer and photographer in Beirut.



PHOTOGRAPHY BY THOMAS F. WALTERS

PETRA
THE UNIQUE
the city that was lost for six centuries

BY JAN VAN OS

When young John Lewis Burckhardt, the Swiss-born explorer, was on his long and adventurous way from Cairo to Damascus in the fall of 1812 he made what was to become the greatest discovery of his life: Petra, the ancient capital of the Kingdom of the Nabateans. Burkhardt's discovery—actually a rediscovery—roused tremendous interest. He was the first man from the Western world to pass through the narrow canyon in Petra since the Crusaders had returned to Europe roughly 600 years before.

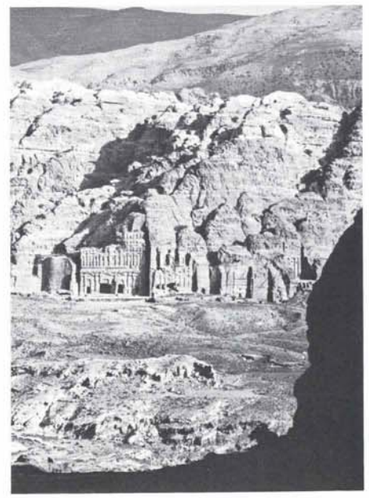
Since then archeologists and historians from many lands have traveled to Petra and explored what the poet Burgon named, in his famous phrase, the "rose-red city half as old as time." But although they came to the conclusion that the area was inhabited as far back as 10,000 B.C., they have been unable to learn much more. Even in recorded history very little is known. The first settlers were called Hortites and for centuries after they made their appearance in history, they apparently lived in the mountains around Petra, which is today part of the Hashemite Kingdom of Jordan. The Hortites were driven out by the Edomites who in turn were ousted by the Nabateans, a people believed to have originated in Northwest Arabia. It was the Nabateans who created the city of Petra, made it the capital of what was then an impressive empire and hacked out of living rocks the monuments that, gloriously, have survived the ages.

The Nabateans were a remarkable people; they were not only great traders and entrepreneurs, but prolific architects and craftsmen as well. They started creating their great city about 300 years B.C. Petra, which is Greek for "The Rock," was called *Rekem* in Aramaic and is referred to in the Bible as *Sela*, soon became a vital link in the flourishing caravan trade between the Arabian Peninsula on one side and present-day Syria and the countries of the Mediterranean on the other. The Nabatean Empire stretched from Damascus to Aqaba to Mada'in Salih and achieved a sufficient level of power and wealth to attract the attention of Rome. In the year A.D. 106 Petra was conquered by the Roman legions and became a province of the Roman Empire. This had no immediate effect on its prosperity—which lasted for another century—but eventually, when one of its main competitors, Palmyra (Tadmor) in present-day Syria, gradually started to emerge as an important caravan trade center, Petra's prominence began to dwindle. The end came when the Romans, using ships to bring the merchandise from South Arabia north through the Red Sea, made caravan traffic so much slower and riskier that it became superfluous. Some inhabitants, of course, stayed on, becoming first Christians, later Muslims. In the 12th century the Crusaders captured the area and built a castle, the remains of which can still be seen. But they went away too and Petra vanished.

Today Petra is considered one of the wonders of the world and tourists from all over the globe have added it to their lists of "musts." This is possible because nowadays Petra has become accessible. From the Desert Highway from Amman in the north, or from Aqaba in the south, visitors can drive as far as the village of Elji where the Wadi Mussa, which leads right into Petra, begins.

There is a new hotel at Elji, built by the Jordan government, but one of the attractions of Petra is that right in the heart of the valley is a resthouse. This resthouse, "Nazzal's Camp," has an annex which is unique in the world: comfortably furnished genuine Nabatean cave dwellings.

Although a few trucks do make the trip now and then—to carry workers, food and supplies to the resthouse—there is no regular motor traffic from Elji to Petra. Thus most visitors go on horseback. Mounts, along with donkeys to carry luggage, can be rented at the police post. It is a leisurely 45-minute ride, but it is also a dramatic experience. First there are the Nabatean temples and tombs to the left and right of the wadi at the unforgettable—and only—entrance to the *Siq*—a gorge that winds about a mile and a quarter through sheer cliffs rising up hundreds of feet on each side, widening just enough now and then to allow the tourists and their little caravan a glimpse of the sky. The *Siq* is so narrow—less than six feet in places—that a relatively small force of Nabateans was able to hold out more than once against a superior enemy.

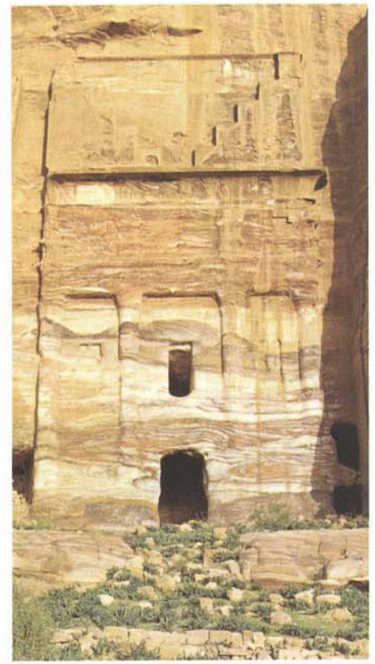


At the end of this amazing gorge, framed in the narrow sunlit slit in the cliffs, the visitor is confronted with one of the most spectacular sights he will ever see: Al-Khazna — "the Treasury" — Petra's most splendid monument, a gigantic temple towering 90 feet in the air and hewn in its entirety out of solid rock that is, without question, rose-red. Most visitors to Petra stop here with an instinctive gasp, especially when they arrive at midmorning when the Treasury, in all its beauty, is bathed in sunlight.

From the Treasury a road leads to the right. There are temples, tombs and caves everywhere. Farther on, to the left, is a fine Roman amphitheater with a seating capacity of 3,000. It is also cut out of the rocks and many cave dwellings had to be sacrificed to make its creation possible.

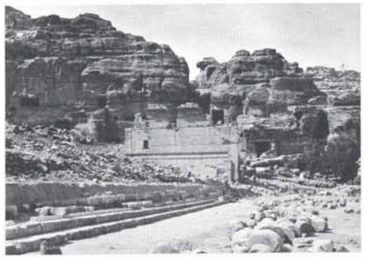
There are more magnificent tombs high on the right—including the two-storied and very impressive Urn Tomb, the Corinthian Tomb, the Palace Tomb

Al-Khazna, "the Treasury," is Petra's most splendid monument, and also the first that visitors see as they enter the fabulous city through the narrow gorge called the "Siq."



Nature's soft pastels enrich the facade of a tomb.

The Roman theater, built for an audience of 3,000.

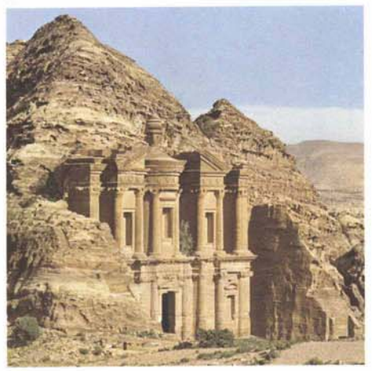


Nazzal's Camp is just behind ruins of Roman temple.

and the Florentinus Tomb and on the left is the Roman city, or what's left of it—which is very little. There is a road, the remains of a market place and a triumphal arch. Behind the arch, on the left, are the ruins of a large Roman temple and, just behind, the resthouse, where caves serve as extra bedrooms. Another enormous temple, some 130 feet high and larger though less beautiful than the Treasury, is al-Deir, "the Monastery," a strenuous hour's climb up from the resthouse along the original Nabatean mountain path. Energetic sightseers can climb to the High Place (of sacrifice) which can be reached from a spot not far from the theater. Here the Edomites conducted their religious ceremonies and here the Nabateans worshipped a deity called Dushara.

These are but a few of the important sights of Petra and it is small wonder that the number of visitors, now about 150 per day during the peak season, is growing from year to year. Some "do" Petra in a day, recording the grand sights through their camera lenses, thinking hard back home, when the films are developed, what it was exactly they went all the way to Petra for. Others, blessed with more time and patience and with an eye for the grandeur of nature and the efforts of man, can spend many days there and still not be satisfied.

Petra, the rock city which once probably housed a community of 30,000 people, is one gigantic and wondrous museum through which one can roam, walking or riding, at any time one likes. And where, unlike any orthodox museum, anything may be touched and photographed.

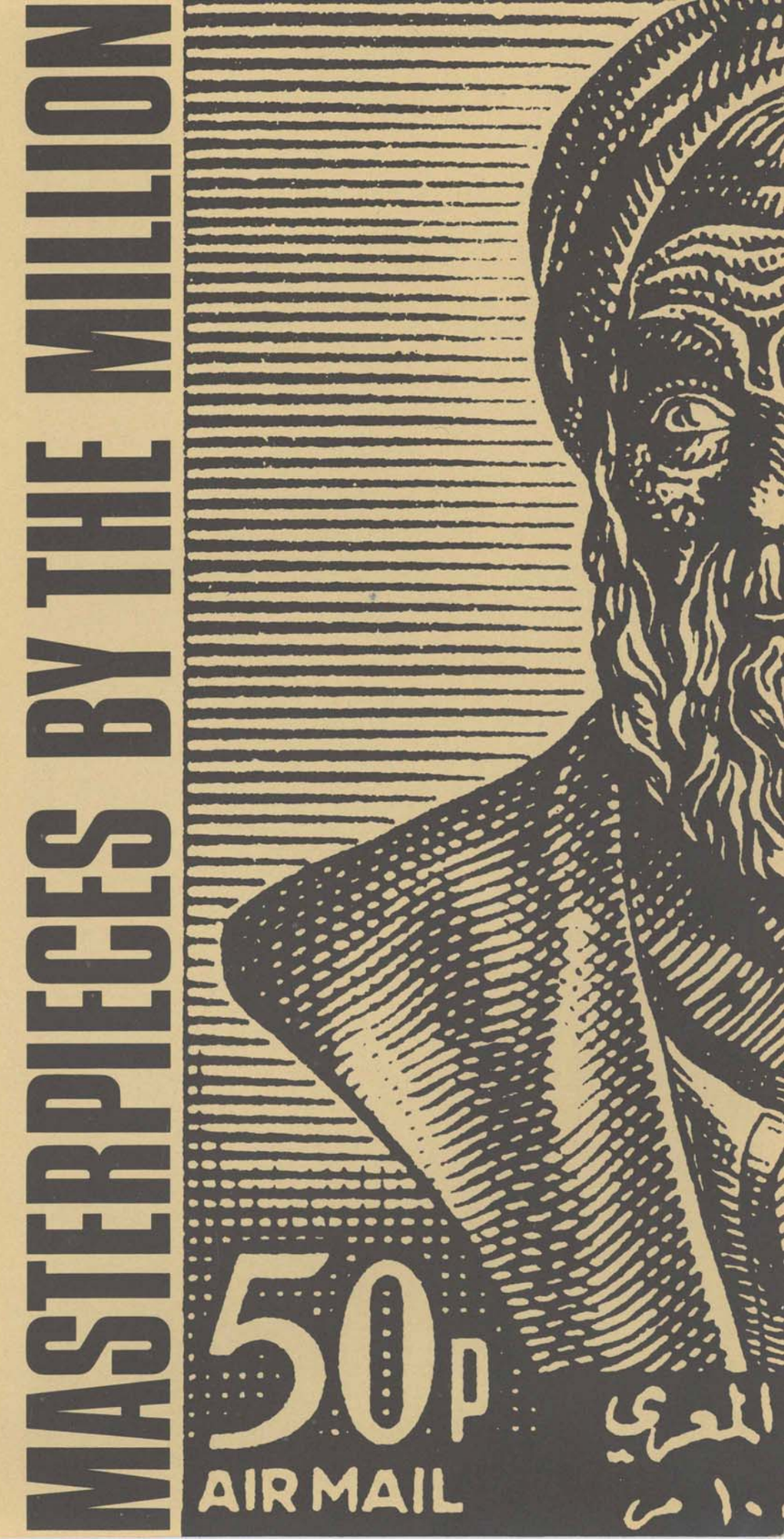


The largest monument is al-Deir, "the Monastery."

An Arab horseman gallops past a cluster of Nabatean tombs where black goats, indifferent to the magnificence of the monuments, graze among the weeds growing in the valley.

Though Petra delights most visitors there are some who find the gigantic, overwhelming monuments and mountains awe-inspiring to such an extent that they are relieved to return to what could truly be called the outside world. Because, as G. Lankester Harding writes in his book *The Antiquities of Jordan*, "Petra is one of those places which you find either incredibly attractive and beautiful, or depressing and sinister; most people find the former, but even so broad-minded a traveller as Doughty obviously disliked the place intensely. But whether you like or dislike it, it is something which should be seen, for there is nothing else like it in the world."

Jan van Os is Assistant Editor of Aramco World.



Two inventions of the why-didn't-they-think-of-that-before variety were introduced to a waiting world about the middle of the last century. One was a pencil with an attached eraser. The other—proposed by an Englishman in 1840—was the postage stamp.

Obvious though it may seem today, the idea of gumming the back of a rectangle of paper was really quite brilliant. It cleared the way for prepaid delivery of mail throughout most of the world. It became the single most essential aid to written and printed communication. Without stamps, in fact, it would be difficult to imagine how normal business or social life would function.

Beyond the purely utilitarian, however, stamps have other values too. With their infinite variety of origins, kinds and purposes they have become objects that are fascinating in themselves, objects which are prized highly and sought with ardor throughout the world by professional and amateur collectors. More recently they have also become art—a highly specialized art combining the skills of painting, photography, drawing, lithography and printing.

To serious collectors, of course, the artistic value of stamps is of scant importance. Philatelists look for other factors—indeed, it is usually the philatelists alone who know the special characteristics that set seemingly identical stamps apart and who will look for features that the ordinary individual who simply wants to mail a letter will never notice.

Collectors, for example, who examine stamps emanating from the Middle East, will immediately—and sadly—notice that whereas stamp paper used to be made of linen or cotton rags, it is now manufactured from the cheaper but faster-deteriorating wood pulp. This trend has philatelists worried because the stamps may not last for too many generations and because there are no longer watermarks on any stamps turned out in the Middle East except those from the United Arab Republic. Sorting out distinctive watermarks in the paper itself adds an extra fillip to the esoteric pursuit of stamp collecting.

In examining Middle East stamps, specialists will also count the perforations at the edge of the stamp. Stamps in sheet have long since come perforated to enable one stamp to be easily separated from another, but to the specialist the number of perforations in a standard linear measurement is of a vast significance. Whereas U.S. stamps carry only eight or nine perforations every two centimeters, Middle East stamps have what philatelists call fine perforations—smaller holes, 12-14 in every two centimeters along their edges.

Impression—the technique used to print stamps—is another characteristic which in the philatelist's view helps give individual issues their special personality. Intaglio, or engraving, and lithography produce the finest-quality stamps, but nowadays those costly methods are being largely replaced, in the Middle East as elsewhere, by simpler offset printing. Some Middle East issues are printed in England and on the Continent by specialized stamp and bank note publishers, but Jiddah, Damascus, Beirut and the Survey Department of the U.A.R. in Cairo are sources of a growing number of stamps from the Arab world.

But if watermarks and perforations, paper and printing obscure the artistic value of stamps, that value is still there to be seen by the attentive eye. It can be found in the delicate lines and rich colors of the birds and flowers of Lebanon, in the fierce eyes of a Syrian poet, or in the airy lightness of a Persian scientist. It can be found in the arch of a bridge in Iraq, in the curve of a desert road in Saudi Arabia, in the angle of a steel tank on the Arabian Gulf.

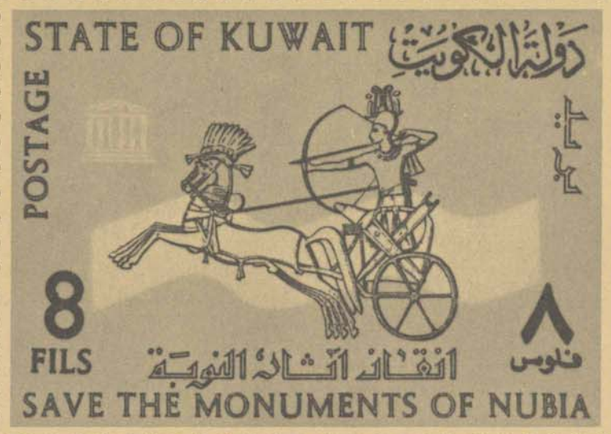
Most stamps, to be sure, are no more than what they are supposed to be: illustrations, catching in a colorful way some place, some man, some monument that has importance in a region or a nation. Such stamps roll off the presses by the millions to be torn off, pasted down, canceled, soiled, and thrown away.

But there are others that are more than illustrations, stamps that in subject or mood or treatment, somehow cross that subtle line that divides illustration and art. There are not many and none, probably, will ever hang in a museum. But here, in our opinion, are some that should ...

— The Editors —

Syrian Arab Republic stamps honor 10th-century poet-warrior Amir Abou Firas al-Hamadani (left) and surgeon Abou al-Kassem Khalaf ben Abbas al-Zahrawi.

PHOTOGRAPHY BY KHALIL ABOU EL-NASR



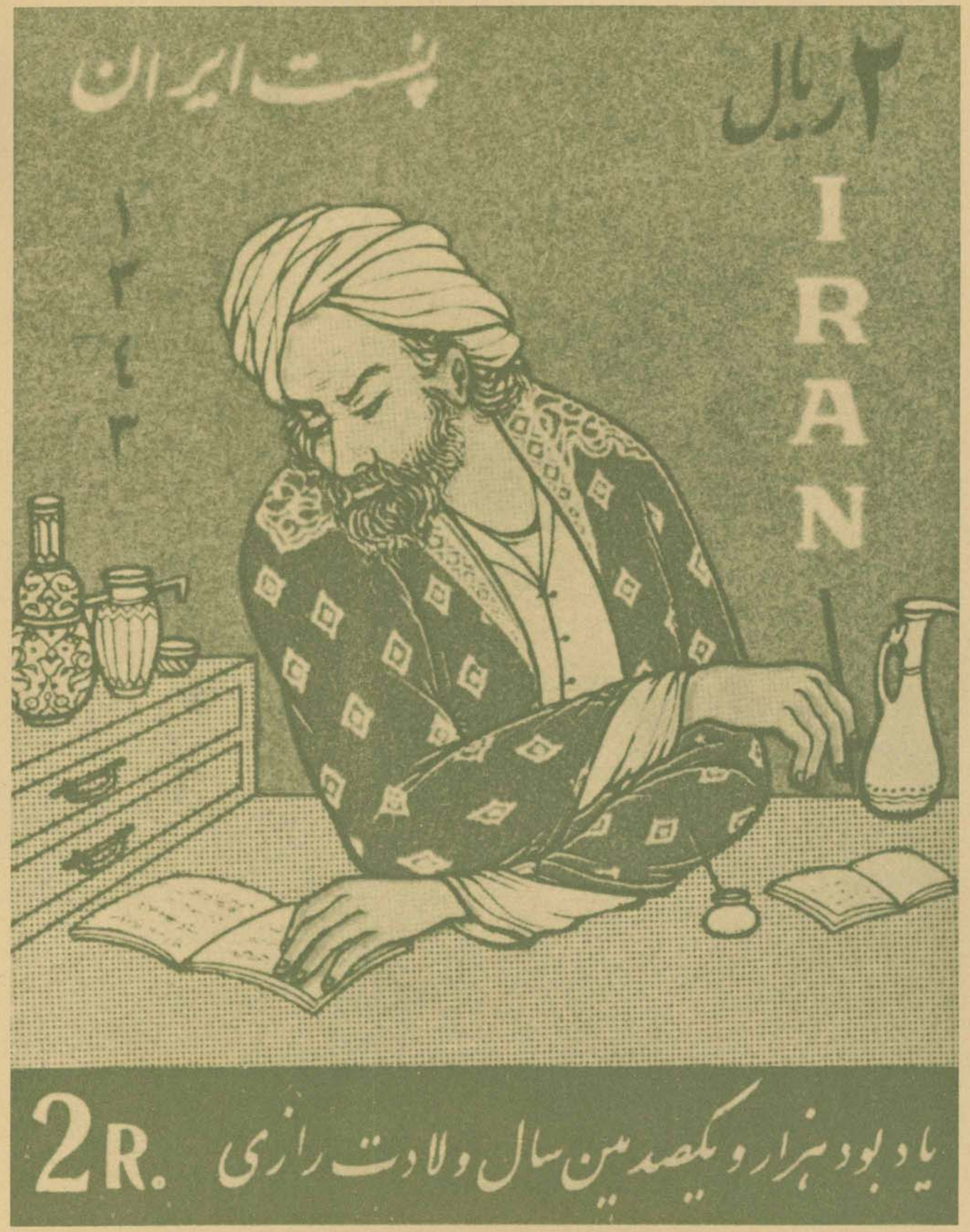
Airmail from the small Trucial state of Sharjah, located near the northeastern tip of the Arabian Peninsula, travels under pictures of an historic local landmark clearly identified as Kalba Castle and of the Ruler of the Arabian Gulf shaikhdom at the time when the stamp at upper left was issued.

New Saudi Arabian stamp, upper right, depicts section of $40 million, 54-mile mountain highway, inaugurated in June 1965 by H.M. King Faisal ibn 'Abd al-'Aziz Al Sa'ud, which links the holy city of Mecca with the summer capital of Taif as part of the Kingdom's major road-building program.

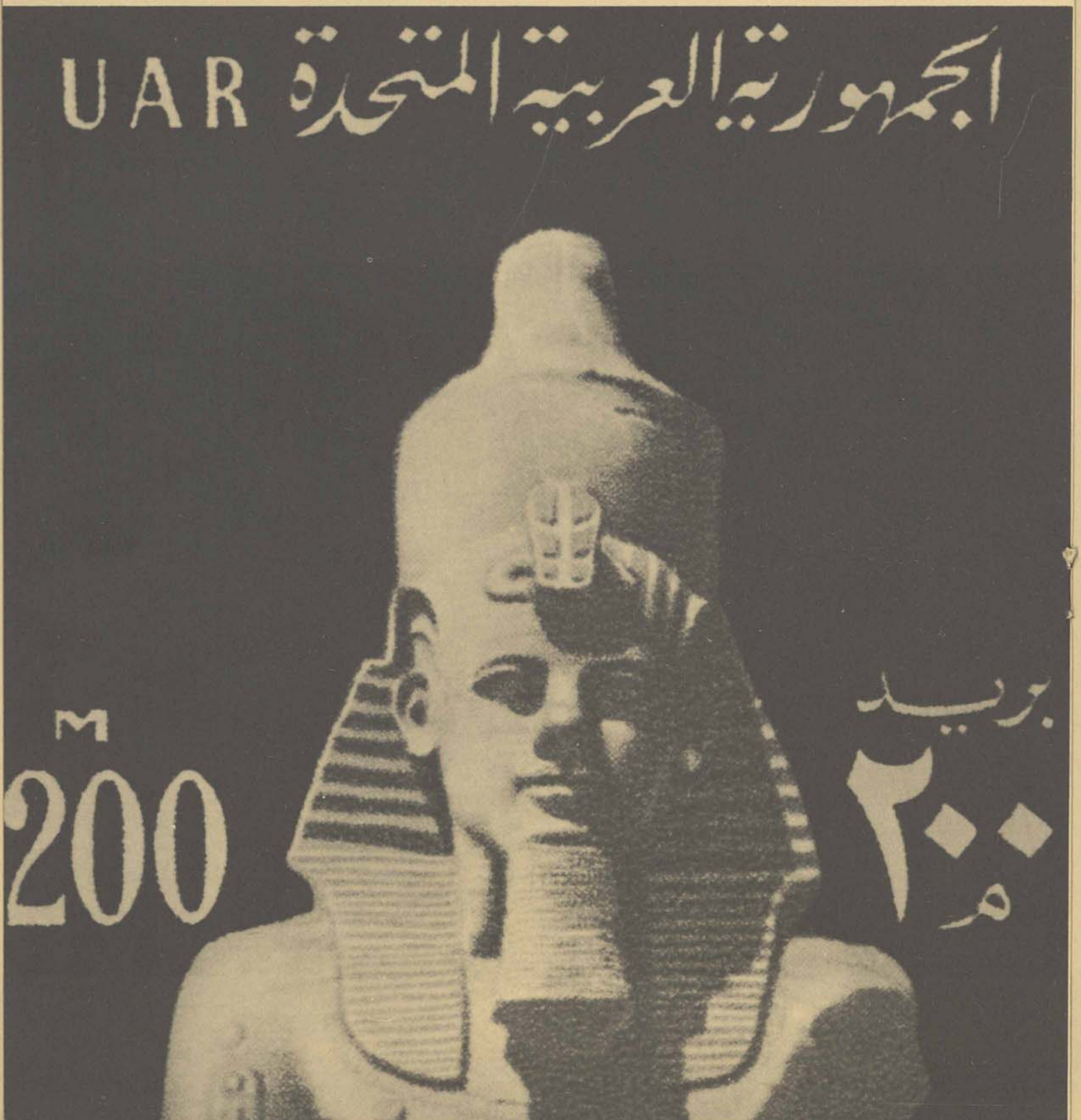
Stamps have long been used to promote tourism in the nations where they are issued. Example at lower left shows waterfront of Amasya, birthplace of the Greek geographer Strabo, in northeastern Asia Minor. It was put out in 1958 in a series picturing scenic spots in 67 cities of Turkey.

Many Arab countries, including Kuwait, concerned over the inundation of Abu Simbel's monuments to be caused by water backed against the new Aswan Dam, issued special stamps to publicize threat and gave proceeds from sales of the issues to help save the 3,000-year-old treasures from being lost forever.

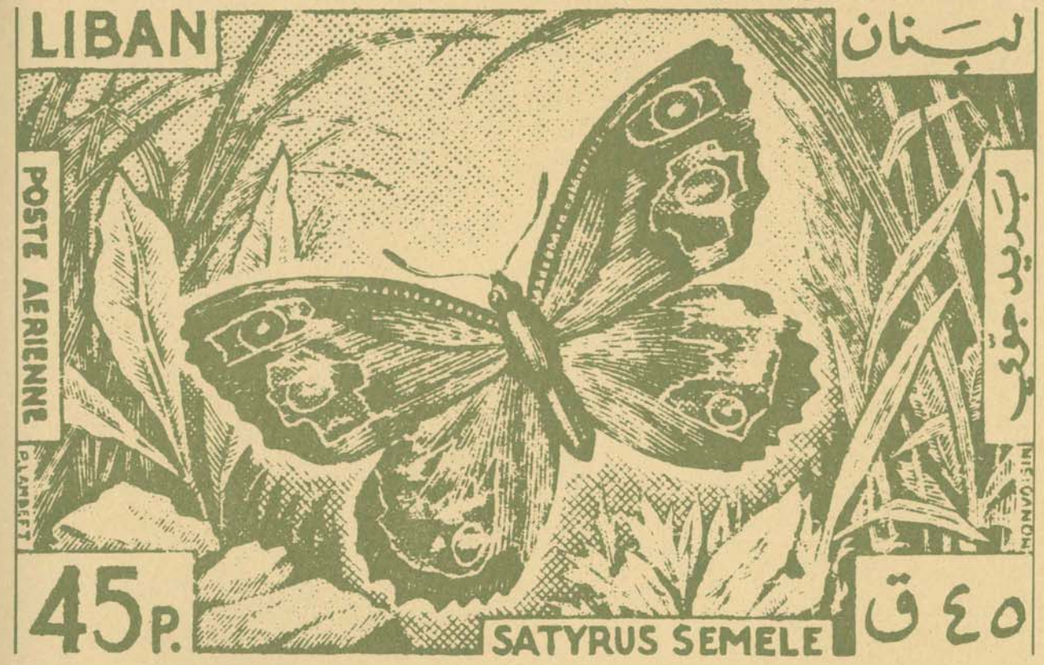
Reminder of the Middle East's ancient scientific tradition is a stamp, opposite, issued in 1960 by Iran to commemorate the eleven hundredth anniversary of the birth of Rhazes Abu Bakr Muhammad al-Razi, pioneer investigator of smallpox and measles and author of an early medical encyclopedia.

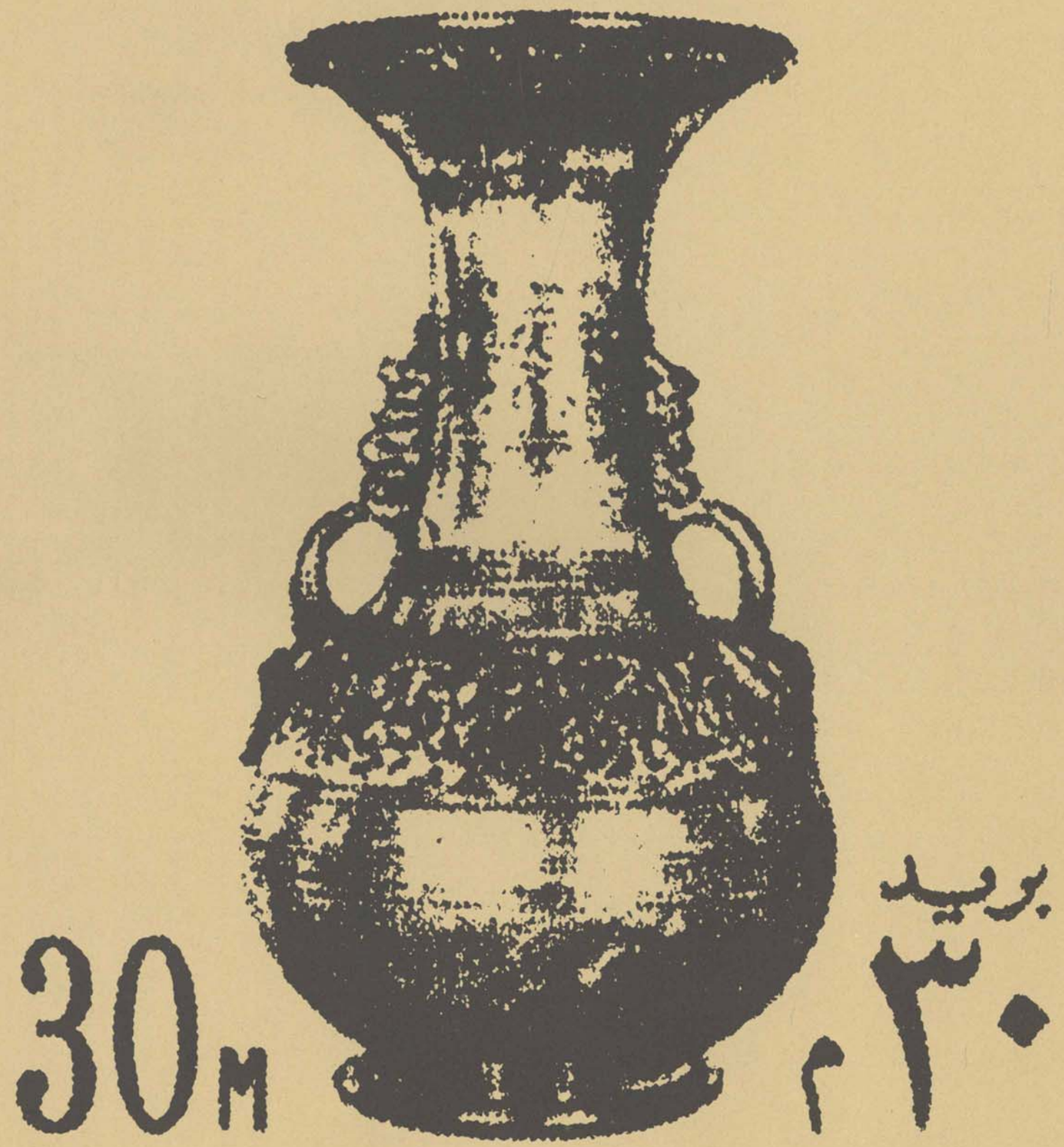


Monumental likeness of the 19th-Dynasty's Pharaoh Ramses II, who ruled Egypt about 3200 years ago, has been reproduced on this United Arab Republic stamp.



Lebanon uses a blue helicon butterfly on one current airmail stamp issue and a redlegged partridge on stamp for surface mail.





Historically-minded United Arab Republic has issued a stamp picturing ornate ceremonial jar or lamp from the 12th-century Fatiman Age.

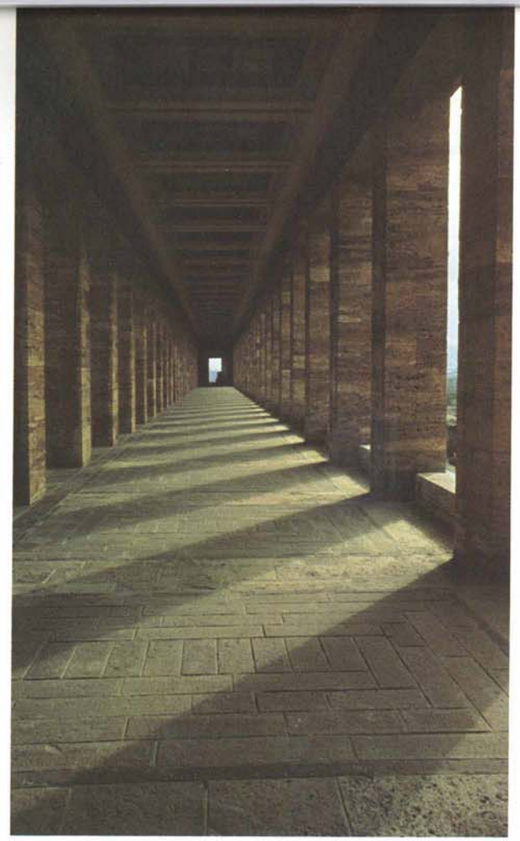
modern yet timeless, simple yet unforgettable

A MONUMENT IN ANKARA

BY FRIEDRICH RAGETTE

Ankara is a surprise, no matter from which direction you approach it. The surprise is that it is there at all. After mile upon mile of steppe, after the emptiness of isolation, you simply do not expect this city. But there it is, suddenly, under an immense crisp sky on a wide plateau, encircled by distant mountains, swept by a wind carrying the dry fragrance of the highland desert.

It is a lovely city. Its boulevards are spacious, its sidewalks broad. Shops, hotels and embassies line the sides of the streets. Splendid roads twist off to the rest of Turkey. There are trees. There are parks. There is a university. And there is the mausoleum. High on a hill where the wind is cold there is the mausoleum—Turkey's tribute to Kemal Atatürk.



A covered colonnade shows the monument's blend of line and texture.

In the West, Kemal Atatürk is virtually an unknown man, a man dimly recalled as having done something or other for Turkey. It is quite otherwise in Turkey. There, he is as vividly alive in the memories of the Turks as on the day he died—the 10th of November, 1938. And rightly so. Few men have crowded into one life as many achievements as this brooding man from Salonica who strode out of the fog in the Dardanelles one morning to smash one of the Britain's finest armies and to open the first phase of what was to be, thereafter, a remarkable life.

Until that morning, Mustafa Kemal, as he was then called, had known more frustation than victory. Born to poverty, he had turned to the army in the hope of finding scope for his drive and talent. But despite an obvious gift for strategy and leadership he never quite dispelled the fierce suspicion and hostility his impatient brilliance generated. Embittered, he was nearly ready to give up. Then came the Dardanelles.

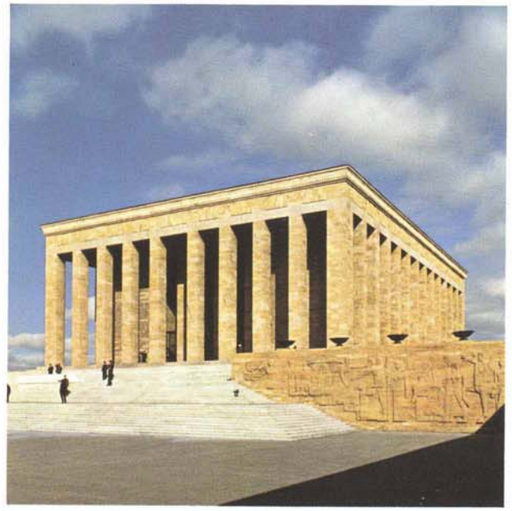
In many ways Mustafa Kemal's victory at the Dardanelles is ironic. For one thing he had been sent there by the new "Young Turks'" government to prevent him from winning precisely the kind of fame he achieved. For another, it brought about the political defeat of the one man who might well have outwitted Kemal at the peace conference—Winston Churchill, who hoped to end World War I by thrusting at "the soft underbelly of Europe."

The tomb, right, is a simple white block above a rich marble floor.

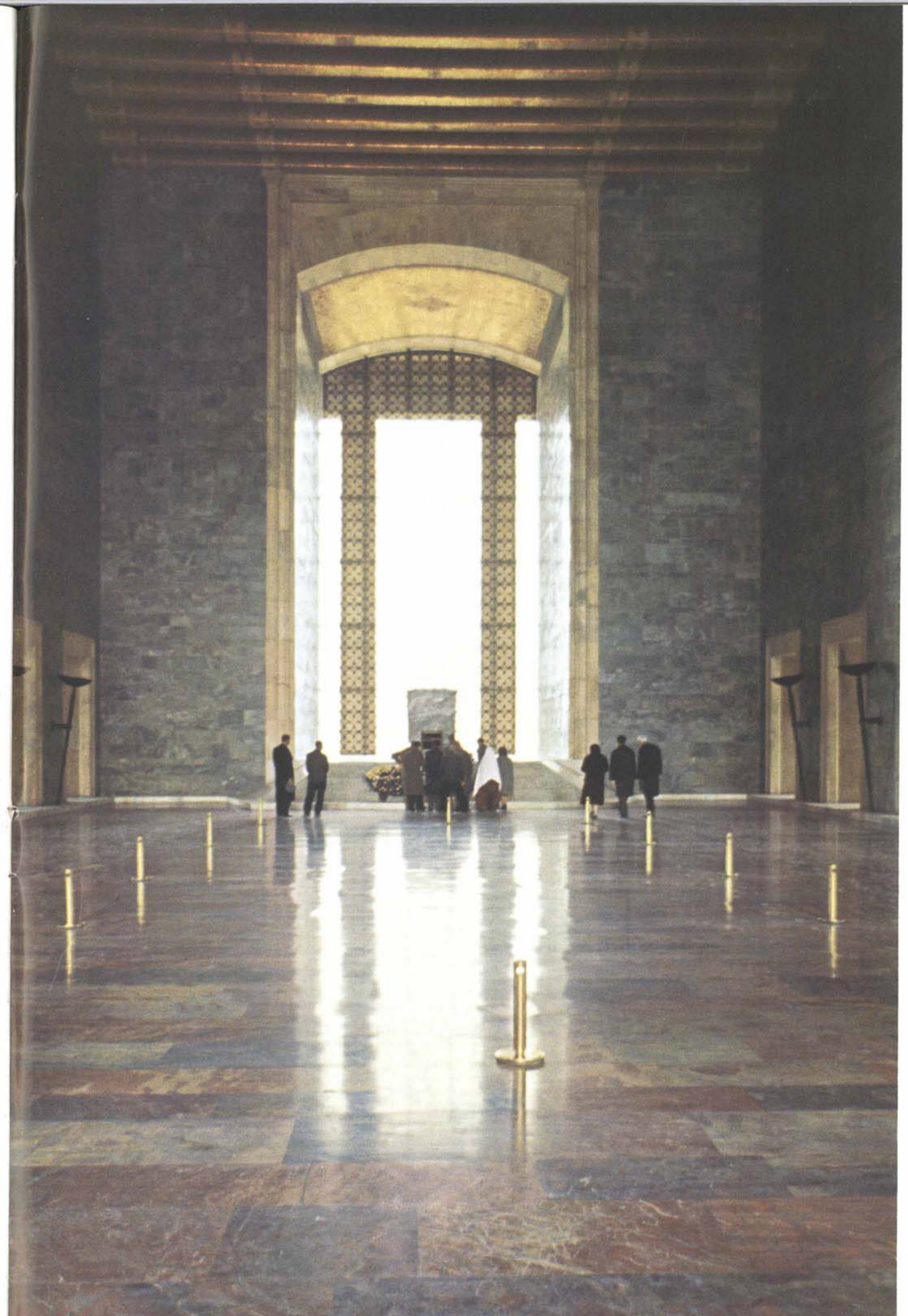
Leading to the mausoleum is a wide magnificent avenue open to the skies.

His victory was also dramatic. Personally discovering the landing of the British—the famous Anzacs—he rallied his troops, planned and executed a counterattack and deliberately exposed himself to the fire of the enemy to inspire his soldiers. Overnight he became a hero—a man so revered that, when the Great War dragged to its disastrous end, he was able to summon the ragged peasantry to his side, block the Allied dissection of Turkey, defy Britain and France, crush the Greek invaders and ordain his country's future in this classically simple way: "My people is a people of warriors which once conquered half the civilized world. The time has come for it to learn how to conquer its own land."

There was never a doubt, after Atatürk died, where he would be buried: Ankara in the high harsh hills of Central Anatolia, the forlorn community he raised to eminence as the capital of the new country and from which he ruled so long. Yes, Ankara was the only place and in 1942, as Atatürk's body still lay in state in Ankara's Ethnographical Museum, Turkey prepared to build in Ankara a monument that would not merely pay homage



PHOTOGRAPHY BY KHALIL ABOU EL-NASR



Turkish soldiers and sailors participate in the changing of the guard.

to a great man and his epic achievements but would become a national shrine, a symbol of modern Turkey.

It was a difficult time for such a project. Europe was rocking under World War II and Turkey was straining to maintain an uncertain neutrality. Yet when the Turks announced an international competition for the design of the monument many countries responded—among them Italy, France, Germany and Switzerland. Germany, traditionally a friend of Turkey, led the way with 11 entries.

Three projects were selected for final consideration by the government: one by Professor Johannes Kruger, who had built the Tannenberg Monument in East Prussia, one by Professor Foshini of Italy and one by Professor Emin Onat and architect Orhan Arda, both of Turkey. On April 5th, 1943, the Committee for the Construction of Atatürk's Mausoleum chose, unanimously, the Turkish project and a drive to raise funds by national subscription was begun.

The architectural problem confronting the designers was not an easy one. What is more difficult than infusing stone with spiritual meaning? But the architects were worthy of the challenge and, with sincerity of purpose and a genuine commitment, they achieved a noble solution.

The key to the solution lies in the harmonious integration of design and site with the whole area of Ankara. The simplicity of concept and forms, together with the beauty of natural materials, make it comprehensible, even to the simplest peasant who comes to stand for a moment and remember.

The location—on a landscaped hill on which no other construction is allowed—generates, almost at once, a sense of expectation. From a large open square where cars are left behind, visitors must climb 33 steps of Kayseri stone, 120 feet wide, before arriving on a wide platform at the beginning of a magnificent avenue that almost commands an immediate approach. Ahead are two low cubed towers flanking a platform where two sentries pace at attention. These towers—striking in their simplicity and symbolic meaning—suggest what is to come: that unique blend of severe line and soft texture. The towers, built of a warm, glowing stone, are repeated eight more times. Massive, yet pierced by a large central opening on every side, they direct the eye, inevitably it seems, toward the scenic splendor beyond.

Two expressive sculptural groups stand there too. Placed right and left at the beginning of the entrance concourse, and scaled to the proportions of the whole monument, they represent the grief of the Turkish people over Atatürk's death. The impeccably kept concourse at first sight appears as a continuous lawn but is in fact a flooring of heavy slabs of stone whose joints are thick with grass. Even the drains are covered with slotted stone slabs to maintain material unity and the entire 780 feet of concourse is edged with the green foliage of trees from all parts of Turkey.

At the end of the concourse, between two towers, the great Court of Honor appears and then, to the left, the mausoleum—a great temple against the sky, Grecian in simplicity, Roman in grandeur. Inevitably, as the architects intended, the eye is carried around the enormous courtyard absorbing and reacting to the experience of sheer space, pausing, as one should at a shrine, to reflect, to think, to remember.

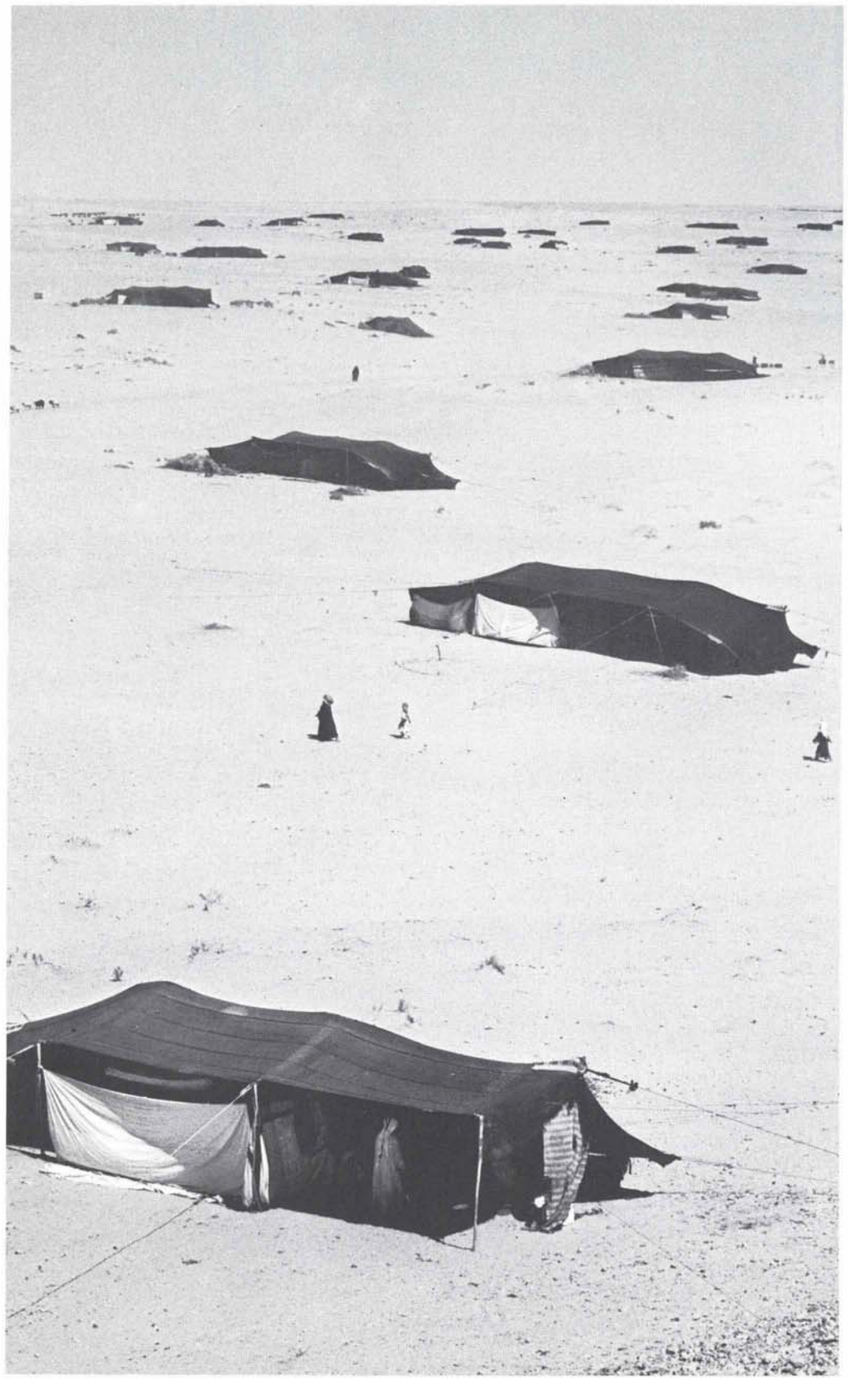
The actual mausoleum dominates the courtyard, but it does not overwhelm it. It faces the north side of the court and looks down from a raised base. The exterior is lined with poplar trees and wide steps, flanked by two huge solemn reliefs depicting scenes of the struggle for victory, lead from the courtyard floor to the entrance. Architecturally, the mausoleum is a modern application of the Greek peristyle temple: a rectangular, closed core of masonry walls surrounded by a colonnade of plain, square stone piers with simple architraves on top. The frieze continues in the same surface, bare of decoration, but constructed as a series of very flat arches, rising a slight distance from the architraves, thereby relieving them of any load, and adding a touch of grace to the stately proportions. A restrained, gently curved cornice crowns the exterior.

Like the ancient Greeks, the builders made use of sunlight, allowing for and stressing the richly-aging yellow travertine from Eskipazar, and the sharp, rhythmic shadows on the core of the building. The vivid change of perspective, as one climbs up the steps and walks toward the entrance of the hall, is arrested by a feeling of arrival as one enters under the colonnade and stops to read the manifestoes of Atatürk incised on the walls. There is an awareness of the dim, well-proportioned space, and the subtle harmony of exquisite materials—red Hatay marble on the floor reflecting the sparkling mosaic on a ceiling whose design was inspired by old Turkish carpets. And then there is the tomb, a plain polished block of rich marble, the massive tomb of the father of Turkey. And there are the people standing in reverence.

What, one wonders, does the woman from Konya think as her steps echo through the space? Does she think of this man as a military leader? As an administrator? As a president? Or as a man who somehow has changed her life for the better? And the man from Erzerum? Does he know that he might today be subject to the rule of a foreign people, were it not for the courage of this man? And the youths, do they recognize that to this man they owe their new schools and hopes for a better life?

It is hard to tell, but somehow one knows they do. And somehow one knows too that if this monument, open to the sweeping winds of winter, to the hot breath of summer, to the blizzards from the hills of Anatolia, is the perfect monument to Atatürk, it is not the only one. There are many others in the hearts of his people.

Friedrich Ragette studied architecture in Vienna and in Chicago, under Mies van der Rohe, and is Assistant Professor of Architecture at the American University of Beirut.



SHELTER OF THE FREE, HOME OF THE RESTLESS...

THE BLACK TENT

BY DANIEL DA CRUZ

In the cities of Saudi Arabia today, as in most cities of the Middle East, the skylines are changing. Up from the low clusters of dwellings and shops rise the strong shapes of modern concrete apartment buildings, office buildings, government buildings—dramatic symbols of change in a land where a more traditional shelter was the famous "black tent."

Possibly because of Hollywood films, bad novels and inaccurate articles, the Western world long thought of—and may still, even in 1966—the Arab world in terms of black tents, without either appreciating the virtues of the life symbolized by the black tent or realizing that in Saudi Arabia, and most places in the Middle East, the black tent is little more than a remnant of a past that has given way to the needs of the present.

Years ago, in the sands of Arabia, there was no more welcome sight to the weary traveler than a black tent on the horizon. Whether it belonged to a friend, a stranger, or even an enemy, a traveler knew that he could claim from its Bedouin owner three days of hospitality. That was the way of the desert and its fame spread all over the world. The black tent became, for many, a symbol of Arab hospitality.

But Bedouin tents were much more than symbols. They were—and still are even in an age when popularity of camping has brought forth dozens of new, efficient, portable shelters—a marvelous adaptation of simple materials to stringent requirements: they had to be easy and fast to erect, light, portable, wind and water resistant, airy, insulated against the sun's rays, easy to maintain and repair, and preferably handsome.

The basic element of the Bedouin's tent was a long, narrow strip of heavy cloth woven from black (or brown) goat's hair or sheep's wool (*not*, as many believe, from camel's hair). The average shaikh used to have perhaps six extra-broad strips of cloth some 75 feet long sewn together to form a great rectangle, which became the roof of the tent, supported by four poles. A more modest, one- or two-pole tent might be made from three or four narrow strips of cloth 25 feet long. In either case the cloth was woven by the women of the family from yarn they spun themselves, if they were real desert dwellers, or bought from village weavers if they were not. Another long narrow strip, the *ruaq*, was pinned to three sides of the roof of the tent by a series of six-inch wooden pins, then draped to the surface of the ground, where the lower edge was buried in the sand or, if the ground was hard, pegged down. The open side, which always faced away from the wind, was further divided by a number of *qata*, vertical curtains of intricate design which separated the various sections of the tent. These generally consisted of a men's section, which doubled as a guest room, a kitchen and women's quarters, called the *muharram* (kin to the word "harem"). The tent floor was the desert itself, sometimes covered by locally woven rugs or, by those who could afford it, with bright carpets from Persia. Support for the heavy tent came from long hemp ropes, two affixed to each pole, and three at each side of the tent. The rope-ends were pegged to the ground if the earth was sufficiently hard; otherwise they were tied to large clumps of brushwood and buried two feet beneath the surface of the sand, bracing the tent as firmly as a ship's anchor.

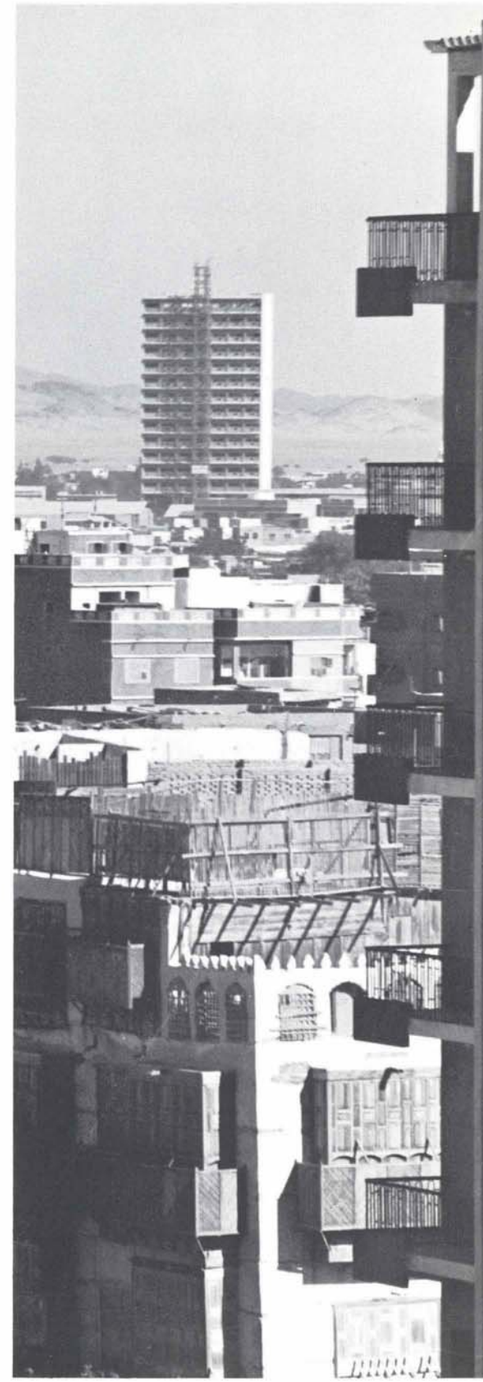
When a Bedouin family moved, the tent was dismantled, rolled up and put on male pack camels. Moves were usually dictated only by the need for water or forage for the flocks of sheep, goats and camels, so the site of the next camp was always in the vicinity of a well or ungrazed land. The pitching of the tent was one of Bedouin women's main functions in life, with the individual jobs strictly divided among members of the family. Raising the main tent poles was the work of men, for example, but driving the tent pegs was usually done by young girls. The whole operation, honed to perfection by centuries of practice, went according to a drill as rigid as a military maneuver, with the head of the family acting as top sergeant: "Spread out the tent, O my people," he would cry, and then, "Stretch out the ropes, O children," and so on through the whole litany until the last, "Spread out the carpet and the *dawashek* (mattresses) and prepare the men's and women's portions of the tent." It was done with remarkable dispatch and when the furnishings were laid out the family was ready to receive guests.

Though the furnishings were few, each article had its place. The master's rifle, for instance, was always hung on the tent pole of the guest chamber (which in Eastern Arabia was always on the east side of the tent), the fireplace was built in the exact center of the same "room," and the row of three coffee pots was ranged alongside the hearth, together with the coffee roaster, the wooden tray for cooling the hot coffee beans, the coffee grinder, the incense burner and the host's camel saddle, in case a guest needed a back rest.

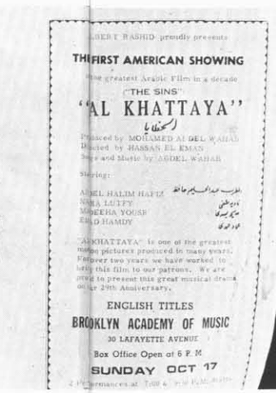
In hot weather the *ruaq* shielding the sides were rolled up to allow the free circulation of air without admitting sunlight. In cold weather—temperatures on winter nights in some parts of Saudi Arabia can drop below freezing—the long *qata* were drawn across the open end of the tent, completely enclosing it, so that the fire kept the occupants cosily warm.

The black tent, of course, is not extinct. Bedouins still roam many areas in Saudi Arabia, and the famous "houses of hair" are still their favorite shelters. But whereas it was once a necessity, today it is becoming an anachronism—a striking contrast by which to mark the sure progress of Saudi Arabia into the world of the skyscrapers.

Daniel da Cruz is a journalist and author who has lived in the Middle East since 1957.



when you want
a narghila,
a kufia or a
dirbekeh, try...



PHOTOGRAPHY BY THOMAS D. STEVENS

DAMASCUS IN BROOKLYN

BY MICHAEL B. SULLIVAN

Six days a week—and on the seventh when the spirit moves him—Elias Malko Karkenni, a chubby, bumptious Syrian of 63, scurries around his oriental food shop breathing in the converging scents of cinnamon, sweet paprika, curry powder, baklawa, pistachioes, almonds, cashews and spices from all over the Middle East. He sets in place the urns of Turkish coffee, the *narghilas* —water pipes—and pouches of tobacco, dusts off the *ouds* and *dirbekehs* and finally throws his doors open to what will be first a trickle, and then a stream, of Turks, Hindi, Greeks and Arabs flowing into his shop.

There is nothing inherently unusual about the scene. Syrian merchants, after all, have been at this sort of thing for centuries. Except that outside Elias Malko Karkenni's shop there are skyscrapers reaching up to a sky crowded with jets. Except that by the docks down the road a bit the largest ocean liners in the world pass by on their way to Europe. Except that Elias's shop is not in Syria. It's in Brooklyn. On Atlantic Avenue, to be exact, right in the heart of an area which is the center of distribution of Middle East food, clothes, music and information.

"You ask anybody in Los Angeles, San Francisco or Miami," says Elias Malko in between bites of cheese which he will share with you from behind his counter, "where you can get Middle East food, wholesale, and he'll tell you Atlantic Avenue."

"And," he goes on, "he'd be right! Look at that." Elias points toward an area five blocks square where, it turns out, there are three community clubs, three pastry shops, two music stores and three bakeries, all devoted to things Eastern and Arab. In addition, there are churches where the Eastern rites are celebrated as they have been for centuries and, a block north of the avenue along a quiet, tree-lined street, the Islamic Mission of America, with New York City's only mosque.

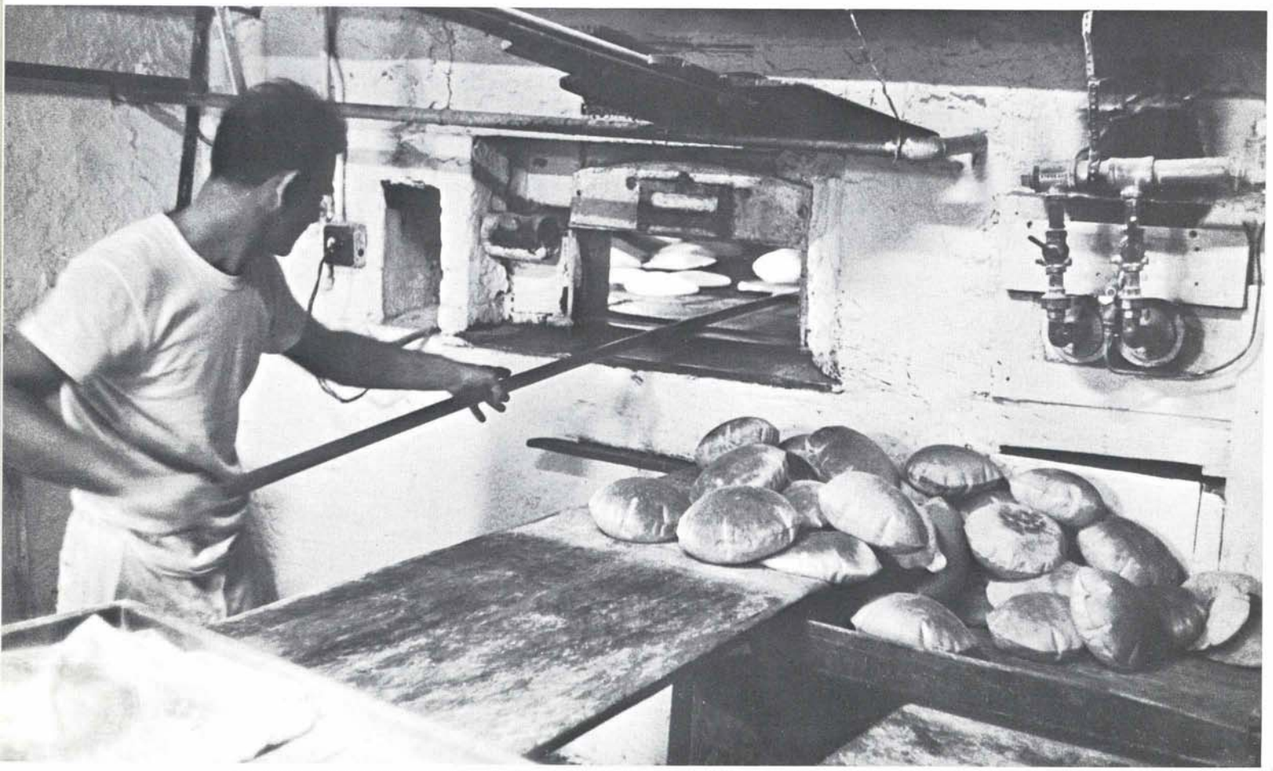
But Atlantic Avenue is the mainspring of the area and if you take the subway from Times Square to Borough Hall station, walk south two blocks and turn west toward the harbor, you can't miss it. Indeed you can't, for as you walk past the unassuming cluster of stores and shops you're sure to hear the wailing chant of a Middle East vocalist, the gentle plucking of the *oud* or the shifting thud of a desert drum. If you stop and look around, you'll see signs above the shops in ornate Arabic calligraphy telling you the owner's trade. In the windows you may see round flat discs of bread and in the air you may catch the smell of roasting nuts or strange spices packed in old-fashioned glass containers. There's no doubt that here in Brooklyn is a genuine slice of the Middle East, transplanted, adjusted, but undeniably the Middle East.

More than 40 years ago there was a great influx of Arabs into the United States, most from the Levant. Following the tradition of their fathers, many of the immigrants set themselves up as merchants in shops along Washington Street on the southwestern tip of Manhattan Island where, in the shadows of Wall Street's high towers, it soon won the name, "Little Syria," and became a kind of informal center of immigration for the Arab world. Barely had an immigrant landed on Ellis Island—just a *zeitoon's* throw off the tip of Manhattan—when the merchants of Washington Street were chipping in to provide a stake and were advising him on how to get on in America. Since most of the newcomers turned instinctively to trade, it's no exaggeration to say that they literally peddled their way across the United States.

In the thirties, however, the Washington Street area began to lose its merchants and after World War II, when much of the area was razed for a tunnel to connect Manhattan with Brooklyn, the remaining shopkeepers followed. They collected along Atlantic Avenue to sell their wares, fewer in number but still strong in spirit. "I'd know my people anywhere," says Joe Shuhda, who roasts nuts across from Elias'. "I know them by their eyes." Or maybe by their coffee cups. For as soon as they settled in, the neighborhood sprouted the traditional coffee shops without which an Arab would be a lonely man. And soon, along Atlantic Avenue, there arose sounds and smells that would instantly be recognized in Damascus or Beirut, voices raised in dispute over thick black coffee, dice clattering in the trictrac box, smoke rising in gentle clouds as the water in the *narghilas* bubbled and gurgled.

Even in Brooklyn, however, the little community faced difficulties. The city decided that the area should be demolished for a housing project and the merchants, facing the prospect of relocating a second time, decided to band together and fight. They formed the Atlantic Avenue Merchants' Association and, in the first campaign of a two-year battle, marched on City Hall. So effectively did they fight that battle that the municipality finally gave up. The Lebanese consul even awarded one merchant who spearheaded the drive a Cedars of Lebanon award for preserving the Lebanese community.

By attrition the community has shrunk over the years and today it is much quieter than the happy days when the area was checkerboarded with coffee shops. But if smaller each year, the community nevertheless survives and some of its members flourish. Joe Shuhda, for example, does a thriving business roasting nuts of all kinds and shipping them, as he puts it, "to other nut houses" all over the city. Next door is Mike Karneeb, called the "Lamb King" by Arabs all over the New York metropolitan area. They come to him from as far away as 100 miles to load their cars, 50 pounds a throw, with his lamb chops, lamb sausages and cubed lamb—ideal for stuffing in grape leaves, cabbage, squash and eggplant. A baker across the street and one flight down runs the Near East Bakery which turns out *halabi*, *shami* and the *marquq* from a massive 75-year-old oven set into the ground under Atlantic Avenue. If you're really famished he can also offer spinach or meat pies that warm the belly on a cold winter day. And there's Albert Rashid who discovered, 30 years ago, that he could earn an extra dinar or two by importing and showing Arab movies. He does this at the Brooklyn Academy of Music, where, periodically between September and May, the 2,200-seat house fills to the balcony and the screen brightens and blares with the latest hit from Cairo or Beirut—usually a film featuring at least one belly dancer and many singers whose efforts inevitably lure the crowd into joining in. Many of the films are old and some are repeated a dozen times, but for the Atlantic Avenue set it's not so much a movie as a visit home and home is supposed to be familiar, isn't it?



Fragrant discs of Arab bread, a staple food in the entire Middle East and a favorite with visitors, are among the products of Brooklyn's Near East Bakery.

Atlantic Avenue's Jamal Aslan, expert on Middle East music and distributor of Arab films and records.

Mr. Rashid, a quiet man of 57 who also runs an oriental music store, still remembers the first film he showed. It was "The White Rose," starring Abd al-Wahab, then a young man. Today he distributes Arab films all over the U.S. and shows a profit, even though he has competition in the person of Djamal Aslan, another music store owner, who also rents films, and is a musician to boot. Mr. Aslan plays the *oud* and sings at functions all over the country. His record company, Cinaraphone, has distribution rights to the works of many Middle Eastern performers and he, like Mr. Rashid, offers a wide choice of beautifully illustrated albums of Um Kulthum, Muhammad Abd al-Wahab, Farid al-Atrash, Nur al-Huda, Abd al-Aziz Mahmud and others whose voices adorn the sound tracks of numerous Arab films.

Despite the apparent preoccupation with eating, drinking and making merry, the area also has a religious character. Not far away is St. George's Church, one of the first Lebanese churches in America, and just three blocks off the avenue, the Church of Our Lady of Lebanon stands on a quiet street. Inside, away from the clamor of the city, a hushed stillness prevails and in a painting that dominates the vaulted, balconied church, Our Lady of Lebanon gazes peacefully down at the Mediterranean, as does the original statue on Mount Harissa. The church serves a sizable congregation of Maronite Christians whose patron, Saint Maron, lived near what was then Antioch, Syria. As Bishop Mansour Stephen, a spry man of "about 70" tells it, the Maronites in New York flocked to Brooklyn as their ancestors flocked to Lebanon. Built back in 1844, the church is being designated one of the historic buildings of Brooklyn Heights and will get a plaque to prove it.

A few blocks further on is the mosque. Though modest by comparison with the well-known mosque in Washington, D.C., it is part of the Islamic Mission in America and on the front is a plaque on which are written the five prayers which faithful Muslims must say every day. In the mosque Shaikh al-Hadj Daoud Ahmad Faisal gives Friday services to Muslims of all callings, from United Nations diplomats to merchant seamen from Middle East shaikhdoms who visit when they are in port. In 1961 Shaikh Faisal made the pilgrimage to Mecca and was invited to be a guest in the palace of the King of Saudi Arabia, possibly in tribute to his zeal in establishing, 33 years ago, a center from which he hoped to explain Islam to America.

Atlantic Avenue's only serious lack is night life. For that you must leave Brooklyn and take the subway to the side streets off Broadway on Manhattan's West Side where a small clutch of Middle East night clubs bearing names such as "Egyptian Gardens" and "Port Said" cater to the New Yorker's yen for the exotic and offer some semblance of the original Middle East entertainment. Any night you can part the curtain, enter the tent and feast your eyes on beautiful dancers whose flashing eyes stir memories of mysterious clubs in Cairo, Beirut or Baghdad. In the same neighborhood there are restaurants named the "Mecca," the "Cedars of Lebanon," or "The Shaikh" and the "Son of the Shaikh," where the succulent specialties of the Middle East dominate the menu.

But for most items it is best to return to Brooklyn, where you can buy almost anything originating in the Middle East. Wadi Sahadi, a neighbor of Rashid's from Zahle, Lebanon, can get between $50 and $200 for richly decorated, Damascus-made swords, once the pride of ancient fighting men. Wadi also sells the pipes that the Bedouin play to lead the sheep through desert places, delicately carved trains of wooden camels, hassocks, leather goods, wallets and musical instruments for those who want to play along with Aslan's or Rashid's records. "The young rock 'n' roll people," he says "love to play the *dirbekeh*." In Malko's place there are long desert *abayas*—a sort of white cassock—with matching *kufias*—headcloths—and gold-lined *agals* to hold the *kufias* in place.

"Only crazy people buy these things," grins Elias. "They cost $25. A lot of people buy them for parties. And one man in Florida who owns five horses bought one to go riding in. If I had five horses I'd buy one too."

So life goes on in this tiny enclave. And despite the distance and the years that separate Damascus and Brooklyn the old ways haven't changed very much. There is the familiar cluster of dark-haired, black-eyed people wandering casually into stores and browsing among the dates, the spices and the watermelon seeds from Baghdad. There are customers inspecting Syrian lentils, *mouloukhia* and dry okra from Damascus, or looking over clay pots, *hilwa* and *tahini* from Beirut. And there are merchants standing there to greet them, saying as they have for centuries, "*Marhaba*," and thus launching a dialogue as old as Damascus itself.

"*Marhabtain*."

"Tell me how much are these in this jar?"

"Ah, these are 59 cents, they are the finest..."

"Indeed, that is strange. I have found kinds like this a few blocks away for only 49 cents. Could they be the same?"

"Ah, but of course not. See here, the fine aroma, the ingredients are straight from. . . ."

Damascus in Brooklyn, indeed.

Michael B. Sullivan, formerly a reporter for the Worcester Telegram *and an associate editor for* Barron's Financial Weekly, *is now studying in Cairo under a Fulbright grant.*

In Brooklyn's modest 33-year-old mosque, Shaikh al-Hadj Daoud Ahmad Faisal conducts Friday services for all Muslims, New Yorkers as well as visitors.