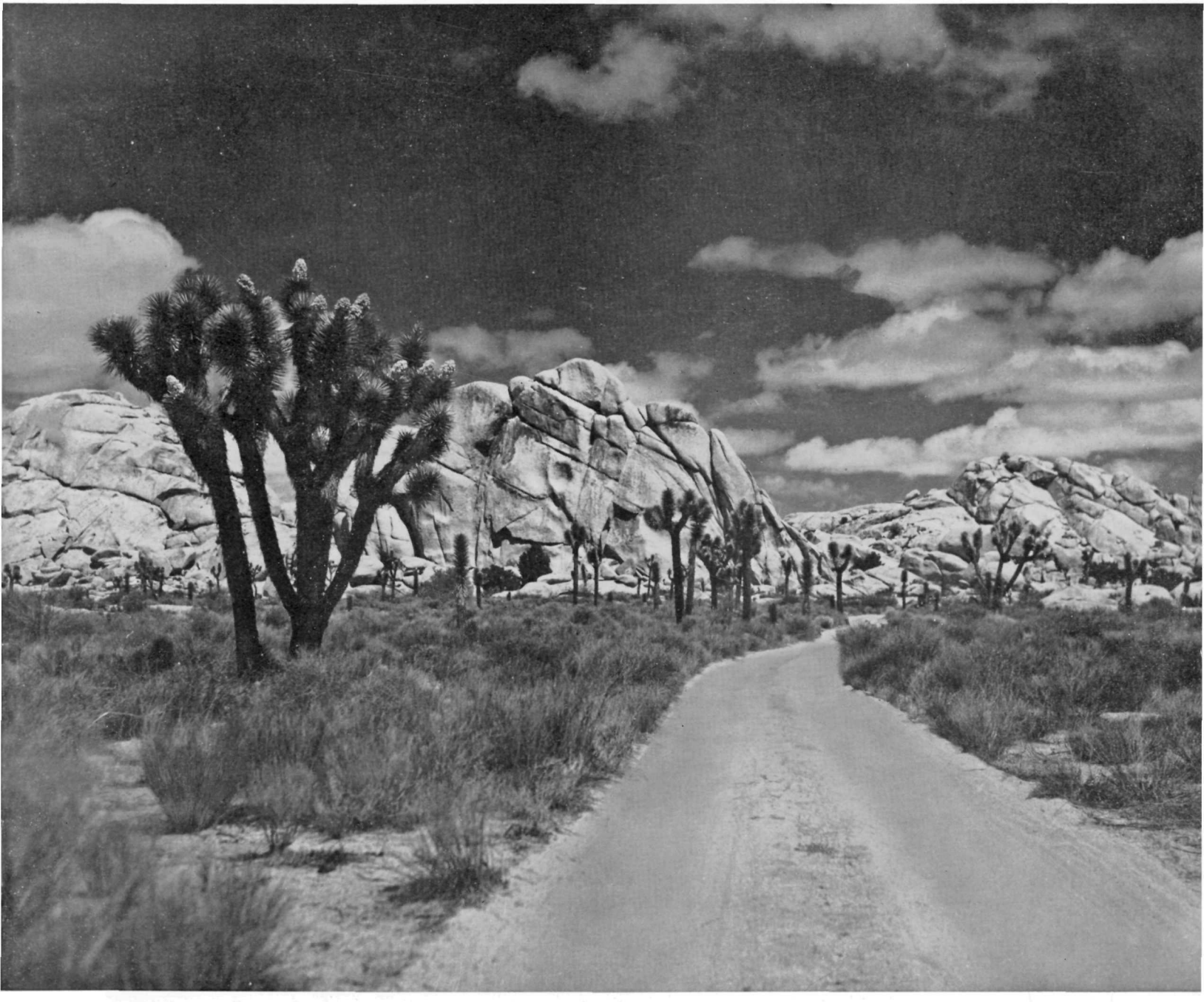
NATIONAL PARKS MAGAZINE



Joshua Tree National Monument, California

May 1960

Our Fourth Shore

Sleeping Bear Dunes, Michigan

National Park Service

STEEPED IN HISTORY and legend, abounding in natural resources, the Great Lakes and their surrounding eight states have played an important role in the discovery, expansion and development of our nation. Lumbering, mining, agriculture and industry have, through the past 350 years, attracted the adventurous, the ambitious, the assiduous in such numbers that the Great Lakes States now encompass over one-third of our country's entire population.

Progress in this respect has been steadily accelerating, and along with its advantages and benefits have come the usual problems and detrimental effects. Of general concern has been the destruction of natural resources. Of particular concern to all Americans is that scenic and natural shoreline values around the Great Lakes have been pre-empted for residential, commercial and industrial purposes without due regard to public needs and benefits.

With a few exceptions, development is concentrated near the large population centers along the southern and eastern lakes. One notable exception is the north shore of Lake Superior where string development and ore-rendering plants have already used up approximately 40 percent of this scenic shoreline. Other string developments along the St. Marys River, around Green Bay and the Straits of Mackinac are contrary to the general rule.

Conversely, the remaining undeveloped areas are primarily along the south shore of Lake Superior, the northern and eastern shores of Lake Michigan, the northern section of Lake Huron and, in most cases, on the lake islands. Such islands are significant because, with the notable exception of Mackinac Island in Lake Huron and the Bass Islands in Lake Erie, these isolated bodies of land have withstood the onslaught of residential development. They may very well become the last strongholds against the "Urban Sprawl." Although inaccessibility presently limits intensive public use potential, it also offers the best opportunities for preserving examples of the natural scene.

Some provisions for public use of the Great Lakes shoreline have already been made. Two areas within the national park system (Isle Royale National Park and Perry's Victory National Monument), encompassing 197 island shoreline miles, have already been established. A third, Grand Portage National Monument, with a mile of frontage has been authorized.

Each of the eight Great Lakes states has at least one major state park on the lakes. Michigan has 33, New York 24, Minnesota 7, Ohio 5, and Wisconsin 3, for a total of 75 which encompass some 163 miles or 3.3 percent of the entire shoreline. This, plus the frontage contained in existing national forests, national wildlife refuges, state forests, state wildlife areas and municipal parks, brings public shoreline holdings to a total of 700 miles or nearly 13 percent of the over-all Great Lakes shoreline.

At first glance, it appears that 13 percent of shoreline should be sufficient public ownership. On the Great Lakes, however, this is not true.

First of all, much of the public holdings are along rockbound shores bounded by icy water. Less than 100 miles, or two percent, are of the Indiana Dunes State Park caliber, where people can actually enjoy active use of both the water and shore.

Secondly, publicly owned areas are generally far removed from population centers. In fact, 66 percent of public shoreline is located on Michigan's Upper Peninsula and Isle Royale where less than one percent of the Great Lakes' 40 million people live. Around the large metropolitan areas of Milwaukee, Chicago, Detroit and Cleveland, existing public ownership provides for only one-quarter inch of frontage per person living within 50 miles of the shore.

Never before in the history of recreation and wildlife conservation have the Great Lakes been faced with the magnitude of recreational use that has roared into the parks, game areas, fishing sites. The reasons are simply these: Our national population continues to grow. Incomes have risen. Living standards have constantly improved. Leisure time has increased. And in most Americans, as in most other people, there is a hunger for the outdoors.

On the Great Lakes this hunger is now being satisfied through the use of automobiles and power boats. The horse and buggy has been replaced by horsepower and, unless steps are taken now to keep ahead, transportation improvements are apt to deplete forever the public recreation resources still available on the shoreline of the Great Lakes.—(*Adapted from National Park Service brochure "Our Fourth Shore."*)

NATIONAL PARKS MAGAZINE

OFFICIAL PUBLICATION OF THE NATIONAL PARKS ASSOCIATION

MAY 1960 Vol. 34, No. 152

Bruce M. Kilgore, Editor

CONTENTS

Our Fourth Shore 2
Texas Treasure Island ..... *Carl E. Cavender* 4
Last of the Frontier Merchants ..... *Edward B. Danson* 7
Monument to a Tree ..... *Charlotte B. Norris* 10
The Parks and Congress 13
Conservation News Briefs 14
The Editor's Bookshelf 16
Your NPA at Work 17
Letters to the Editor 18
Great Lakes Seashore Recommendations 19

ON THE COVER

In addition to preserving magnificent stands of Joshua trees, cholla cactus, and other desert flora, Joshua Tree National Monument, California is a wonderland of striking granite rock formations as our cover photo indicates. Established as a national monument in 1936, the 870-square-mile area lies midway between the Mojave and Colorado Deserts—thus explaining in part the many and varied species of desert vegetation. As indicated by author Charlotte Norris in her article on page 10, this is a region of year-round sunshine, where camping is available even in winter—provided you bring your own water and firewood.—Photo by Weldon Heald.

THE NATIONAL PARKS AND YOU

Few people realize that ever since the first national parks and monuments were established, various commercial interests have been trying to invade them for personal gain. The national parks and monuments were not intended for such purposes. They are established as inviolate nature sanctuaries to preserve permanently outstanding examples of the once primeval continent, with no marring of landscapes except for reasonable access by road and trail, and facilities for visitor comfort. The Association, since its founding in 1919, has worked to create an ever-growing informed public on this matter in defense of the parks.

The Board of Trustees urges you to help protect this magnificent national heritage by joining forces with the Association now. As a member you will be kept informed, through NATIONAL PARKS MAGAZINE, on current threats and other park matters.

Dues are $5 annual, $8 supporting, $15 sustaining, $25 contributing, $150 life with no further dues, and $1000 patron with no further dues. Bequests, too, are needed to help carry on this park protection work. Dues and contributions are deductible from your federal taxable income, and bequests are deductible for federal estate tax purposes. As an organization receiving such gifts, the Association is precluded by relevant laws and regulations from advocating or opposing legislation to any substantial extent; insofar as our authors may touch on legislation, they write as individuals. Send your check today, or write for further information, to the National Parks Association, 1300 New Hampshire Avenue, N.W., Washington 6. D.C.

NATIONAL PARKS MAGAZINE is published monthly by the National Parks Association. School and library subscription $4 a year. Individual copy 50 cents. Letters and contributed manuscripts and photographs should be addressed to the Editor, 1300 New Hampshire Avenue, N.W., Washington 6, D.C. The National Parks Association is not responsible for loss or injury to manuscripts and photographs in transit. Return postage should accompany contributions. Title Registered U.S. Patent Office. Printed in the United States. Second-class postage paid at Washington, D.C.

John L. Tompkins Realtors Photo by Roy Clark

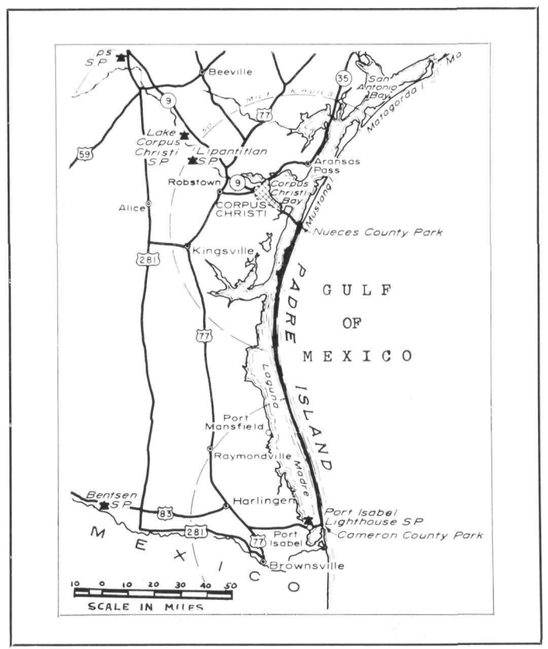
Sand, sea, surf and sky mingle with ghosts of pirates along Padre Island's picturesque coastline. Beach Croton and sea-oats are two of the most common plants on the island.

Padre Island on the Gulf of Mexico is a

Texas Treasure Island

By Carl E. Cavender

Some 88 miles of the 117-mile island—located between Corpus Christi and Brownsville, Texas—are being considered for national seashore status.



BEHIND THE STROKE of the painter's brush or the lens of the naturalist's camera, there is harbored a longing to seek out *his own* serenely hallowed oasis. These expanses of unmarred natural beauty are fast becoming few in number, because the waves of civilization are washing development across our lands. Our systems to preserve these numbered tracts are spurred forward by a few elbow-swinging conservationists, who hope that tomorrow we may look proudly upon our land and recall its beginning.

Bordering the warm tidal currents of the Gulf of Mexico lies 117 miles of white rolling sands, that are—and have been for some time—under consideration as a national seashore site. Padre Island is a desert, an oasis, and the perfect picture of desolation itself. To the misconceptions of a few, Padre Island could *never* become another Miami Beach—at least not without expenditure of millions of dollars. What then is the destiny of these sleeping dunes?

One morning, into the horizon's orange, spring sunrise, I steered my car via Corpus Christi's *Ocean Drive* route, thirteen miles to the bow-shaped Padre Island. This was a common sight to me, a resident of the Coastal Bend; but with each trip my eyes searched out new adventure.

As I crossed the four-mile span of causeway to Padre, my attention was captured by a flock of pelicans, about seventy-five in number. The white birds nestled in the glistening salt waters of Laguna Madre, that six hundred square miles of inland waterway which is sometimes called "the last leg" of the Chicago to Brownsville Intra-coastal Canal.

Laguna Madre is profusely spotted by tiny islands that are literally swamped with bird life. The more popular of these islands in this marshy area, are Big Bird and Little Bird Islands. Until recent years, many of these tiny islands were relatively unexplored by anyone other than fishermen and duck hunters. They have thus remained the perfect nesting place for birds.

Quite like our feathered friends, I too was seeking a retreat. On this particular morning my quest was for driftwood and old bottles. My destination was any part of the beach which was uninhabited and lacking the beer shanties and other eyesores from which I wanted to escape.

My car droned along the hardened sand at the water's edge, on the Gulf side of Padre. I had picked the perfect time for my driftwood hunt, the tides were dropping and the winds were subsiding from a recent storm, leaving the debris-cluttered beach a beachcomber's paradise.

Cars with sixteen inches of wheel clearance can be lost to the clutches of the softer sands, as I have learned from experience, so I continued to ride the wet sands near the water. I was ever dodging the trash that had been lashed upon the shore. It was hard to distinguish between a jellyfish and a bottle; there were thousands, no—there were millions of the blue-red bubbles that had been cast to their destruction upon the scorching sand.

I was amazed first by the large flock of pelicans; then there were the jellyfish (more than I ever imagined I would see in my lifetime); but *here*, I arrived at my destination.

Anthony Wayne Smith, Executive Secretary, and Clarence Cottam, NPA Board Member, third and fourth from left, discuss Padre with local officials in April, 1959. Armand Yramategui, local NPA group chairman, is at far left.

The drift was piled higher than houses and extended the length of the beach. Trees, too big for a truck to move and logs of all shapes and sizes were jutting from the barrier. I found bamboo, coconuts, and several other varieties of drift that must have traveled thousands of miles to rest on Padre's shore. I also found a small raft and wondered from what distant isle it might have come.

Centuries of storms like the one just passed have made the history of this island. I had come to Padre to "get away from it all," and indeed, I was, for I was alone with history.

Padre Island's storybook had no beginning, as we know it; but it had to start somewhere. Cannibal Karankawa Indians were probably the first human

Coastal islands and adjacent waters of Texas provide a most important bird habitat.
National Park Service

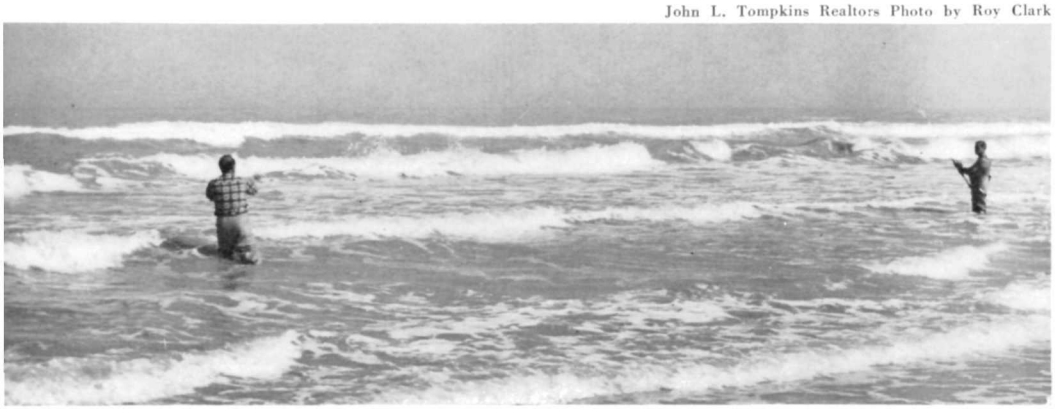
A long stretch of undisturbed beach south of Corpus Christi. The ebbing tide has left a scalloped border of wet sand at the high water mark. Note the three nearly parallel lines of breakers moving toward shore.
National Park Service

Carl Cavender works in a South Texas oil refinery, but he calls himself a "rockhound and beachcomber." His interests range from skindiving to writing Limericks.

Texas Highway Department

Picnicking and surf fishing are but two of the varied kinds of recreation that could be offered by a national seashore on Padre Island. Some visitors may prefer to study the great variety of birds and ocean life or to investigate rumors of hidden treasure.

John L. Tompkins Realtors Photo by Roy Clark



inhabitants of this barren waste, and were later followed by other tribes and Spanish and Anglo-American settlers, who rid the lands of them. Pirates and smugglers, soldiers and sailors, fishermen, beachcombers, and cowboys later followed; and now come the tourists.

Pirates and Spanish Treasure

Padre was first called Isle de Santiago, then explorer Parilla named it San Carlos de las Malaguitos. It was finally tagged after the Padre Nicolas Balli who was granted the land by the King of Spain. At this time, the island was separated from its neighboring brother, Mustang, to the north, but due to shifting sands along Devil's Elbow, the Corpus Christi Pass was closed, thus joining the two islands.

At least one of the towering dunes may hoard a vast amount of treasure, according to historical reports. A violent hurricane developed in this region in 1553, and a Spanish fleet headed for Spain via the Bahamas was caught in its treacherous winds and waves. Three ships went under and four limped into the Bahama port, but thirteen were forced by currents and high winds to the ghostlike arm of the sandbar, Devil's Elbow. Only two men of three hundred men, women and children survived the horrible slaughter by hostile savages in an island-long chase.

The King of Spain detailed salvage expert, Don Angel de la Villafana, who remarkably recovered the booty from twelve of the ill-fated ships with the help of his crew. A skindiver myself, this seems an impossible task without the modern diving gear we use off Padre's waters today. So one ship remains somewhere along the once open Corpus Christi Pass; its estimated hoard is in the high thousands.

Another report of treasure upon Padre Island's sands is that of the $62,000 fortune believed buried by John Singer, who along with his family was shipwrecked in their yacht in 1847. An expedition in June of 1958 found remnants of a "Lost City" and some old relics, but no $62,000.

Maybe there are no real treasures on Padre Island, but we like to think so; and tales about the pirate Morgan and smugglers of the early days give Padre an intriguing and alluring past.

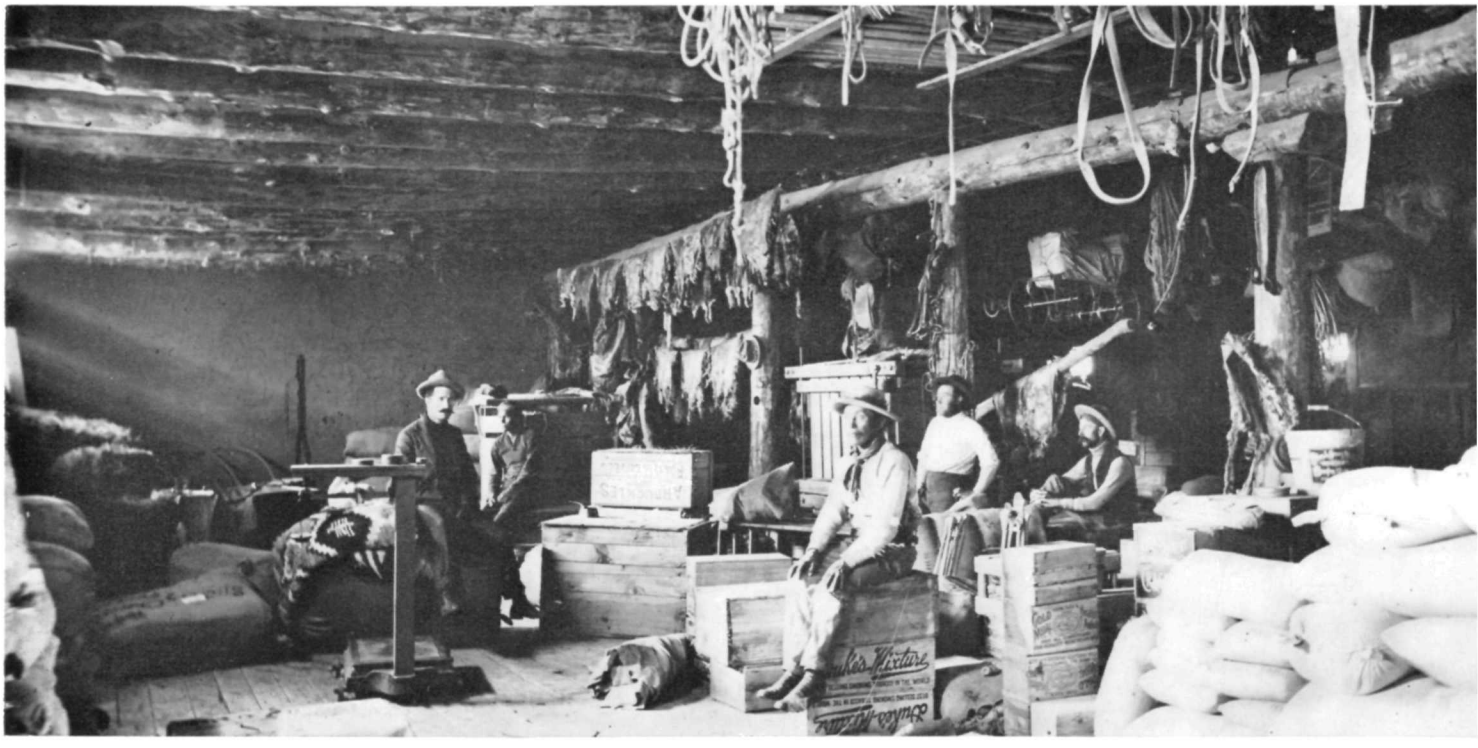
We shake our heads to clear them of dreams, pick up our own little treasures of drift and decorative old bottles, and leave Padre alone with its history, as we head for home.

Leaving Padre is like leaving another world—the wilderness of yesterday. The coyote, the rattlesnake, and the rabbit live together here. This is the summer home of a multitude of migratory birds. Its waters have one of the largest variety of fishes along the Gulf Coast. The sea grass atop the dunes seemingly waves a goodbye with the wind. But this is yesterday.

What of Padre's Future?

The future of Padre Island lies with legalities. This perfect playground with its sloping beaches and sometimes forty-foot-high sand dunes must be preserved in its natural state. Somewhere, some day, something good is in store for this island. It has a future.

The concern for its future has been exemplified, as far back as 1937 with the first State Park Bill proposal. I for one hope the elbow-swinging of the conservationists will not go unwarranted and that tomorrow Padre Island will be the same sleeping dunes in all its wilderness and serenity. ■



Warehouse at the Hubbell Trading Post about 1905. Photo by Ben Wittick, courtesy of Anthropology, Santa Fe, New Mexico

Last of the Frontier Merchants

Navajo still barter at Ganado, Arizona Trading Post

By Edward B. Danson

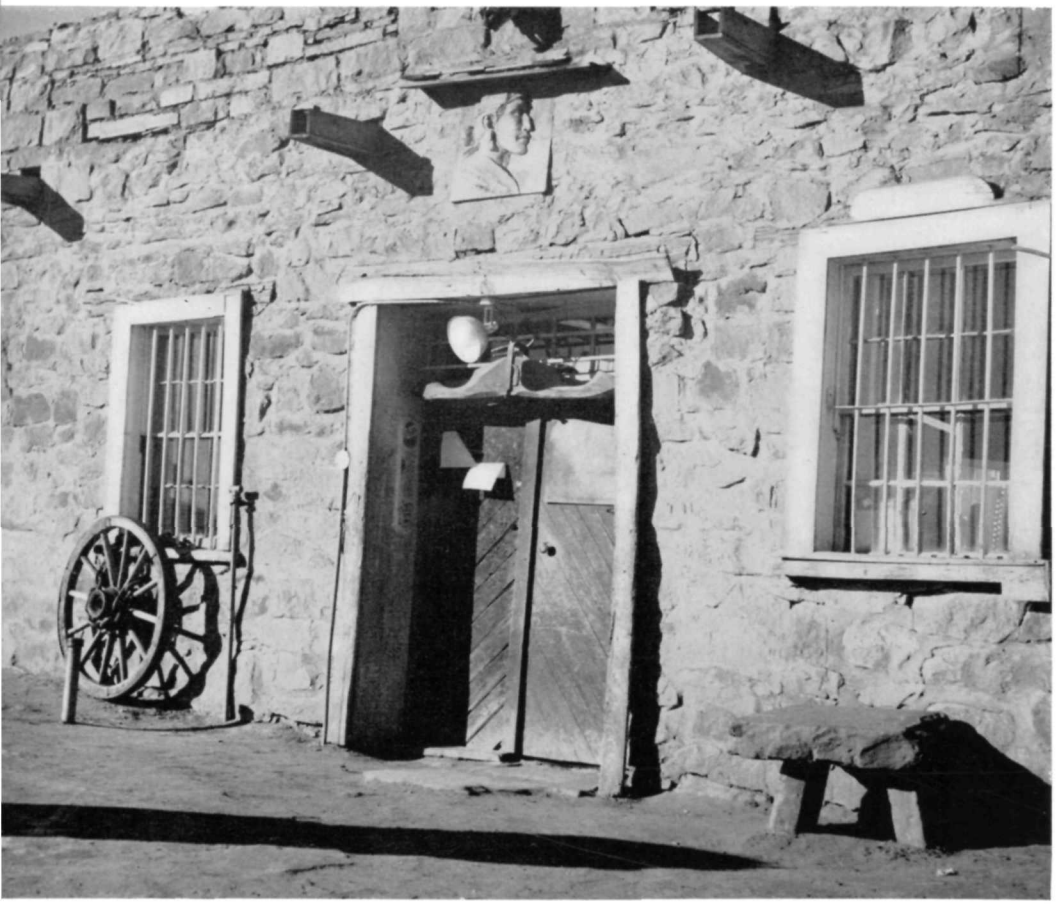
FUR TRADERS and the men who built trading posts were always in the forefront of westward expansion in the United States. The settling of the West would have been far more difficult without the traders, whether permanent or transient, for they made the first contact with the Indians. Because they were the first men to give the American Indians their taste for European trade goods, in time they caused the Indians to be at least partially dependent upon the European way of life.

In Arizona, part of the last frontier, a few of these trading posts are still in operation. The Hubbell Trading Post at Ganado is an outstanding example, and seems to typify trading posts in the old West as well as those in the southwestern part of our country.

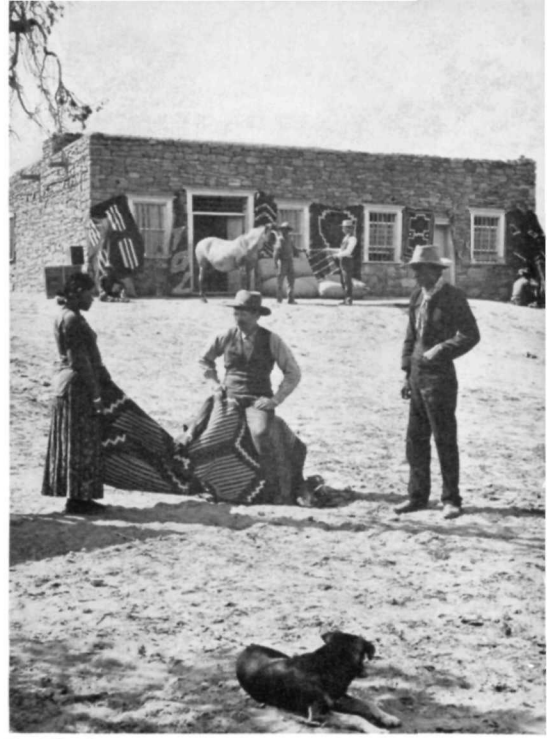
The man who established the post and ran it for half a century was John Lorenzo Hubbell, better known as Don Lorenzo—one of the most colorful figures of his time. He was born in 1853 in the little adobe town of Pajarito, about six miles south of Albuquerque. His father, James Lawrence Hubbell, had come to the Territory of New Mexico from Salisbury, Connecticut, and married Julianita Gutierrez, whose family had once been given a large land grant between the Rio Grande and the Rio Puerco by the King of Spain.

Don Lorenzo spent an adventurous boyhood and youth among Mormons in the Utah territory. There he learned to know the ways and customs of several Indian tribes. In 1872, at the age of nineteen, he settled down to work in a trading store at Fort Wingate, near Gallup, New Mexico. Here he gained business experience in trading with the Indians, and learned to speak Navajo and Hopi fluently. He knew Spanish, the language of his home, and had learned English during four years of

Although he is presently the director of the Museum of Northern Arizona in Flagstaff, Edward B. Danson also serves as Secretary of the National Park Service Advisory Board. In addition, he is a member of the boards of the Southwestern Monument Association and Rocky Mountain Forest Experimental Station. He previously taught anthropology at the Universities of Arizona and Colorado.



National Park Service



Ben Wittick

Don Lorenzo Hubbell trades with a Navajo woman for a blanket, about 1905. Post in background was built in 1900.

LEFT: The main entrance to the present Hubbell Trading Post, the last important example of old-time Navajo trading posts.

schooling in Santa Fe, New Mexico.

About 1875, Don Lorenzo married Lina Rubí, a Spanish-American girl. It is interesting that two of the three European forces represented in the history of the West—the Spanish of his mother and wife, and the Anglo-American of his father—are brought together in Don Lorenzo. The Hubbell Trading Post and its history reflect these two influences.

The First Post

In 1876, soon after his marriage, he bought a trading post at Ganado on the Rio Pueblo Colorado. The original post was a small house built in 1875. In 1880, the present post was built and the old store was torn down in 1900.

In the 1870's, the Navajo Indian Reservation boundary had not been extended as far south as the Rio Pueblo Colorado, and in 1878, Lorenzo Hubbell homesteaded 160 acres, where the trading post stood. When the reservation was extended in January, 1880, it included Ganado.

Culture on the Frontier

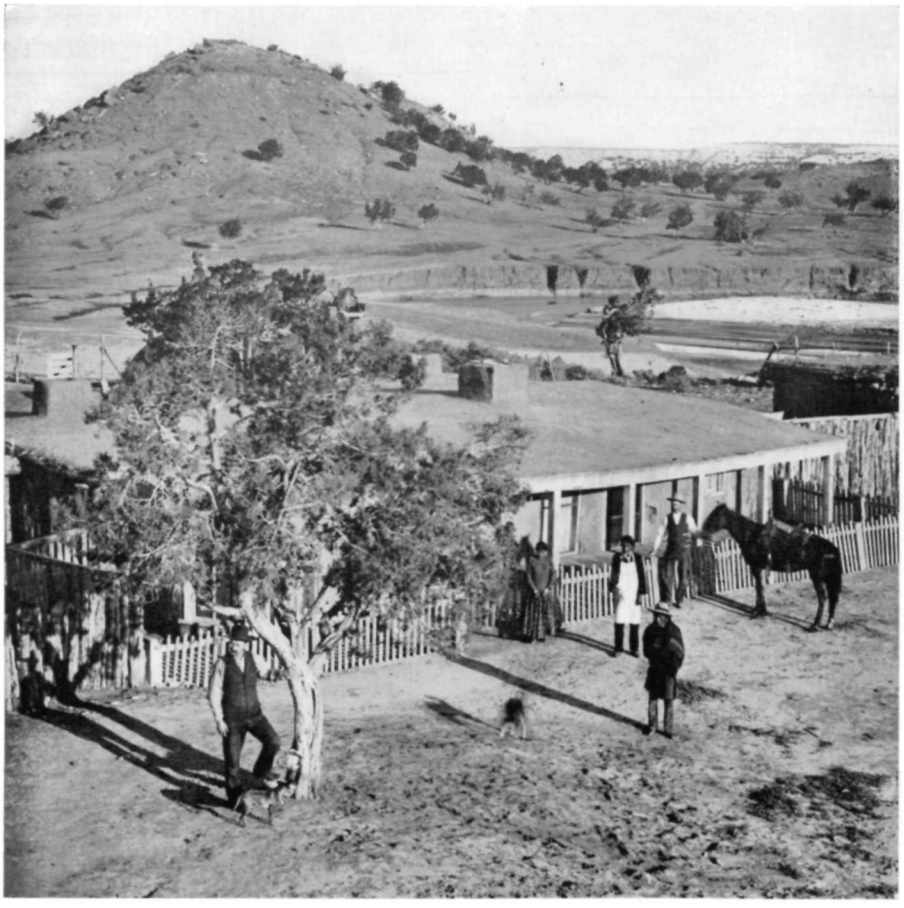
No provision had been made for private lands within the reservation boundaries, and an Act of Congress was required to confirm the title. The Act was on President McKinley's desk in 1901 when he was assassinated. Among the first actions of President Theodore Roosevelt was the signing of the bill. The homestead was finally granted in 1908.

The new house which Don Lorenzo had built in 1900 next to the trading post became a center for artists, anthropologists, writers and other visitors to the Indian Reservations. The house, of reddish brown stone with adobe mortar, had a long living room with bedrooms opening on each side. The north end of the room was used as the living room and the south end, with its long table, was the dining room. The kitchens were across a patio in a separate building.

Many were the visitors who enjoyed the hospitality, free to all, rich or poor, extended by Don Lorenzo in the old Southwest fashion. Herbert Spencer, George Eastman, Theodore Roosevelt, and Generals Lew Wallace, Hugh Scott and Nelson A. Miles, were some of the distinguished visitors mentioned in the guest book. Among the artists were E. A. Burbank, C. E. Dutton, Carlos Vierre, Bert Phillips, and Emery Kopta. Writers who visited the Hubbells included Charles F. Lummis, Mary Roberts Rinehart, and Hamlin Garland. Anthropologists Adolph Bandelier, J. Walter Fewkes and Sylvanus G. Morley were also well-known to the Hubbells.

In appreciation of the Hubbells' hospitality, visiting artists gave them examples of their work, and the walls of the living room and all the bedrooms are covered with these drawings and paintings. An especially interesting collection is the more than two hundred sketches of Indian heads by E. A. Burbank.

In the post itself are many fine examples of Navajo crafts that date back to the late 1880's. Don Lorenzo was



Ben Wittick, Courtesy of Laboratory of Anthropology, Santa Fe

Ben Wittick

Don Lorenzo at his home in Ganado, which was a center for artists, anthropologists, writers and other visitors to the Indian Reservations.

LEFT: This log and adobe structure, built by William Leonard in about 1874, served as Hubbell's trading post until 1900. Hubbell Hill in background.

particularly interested in patterns and had Burbank make color paintings of old Navajo designs. When a Navajo weaver came into the shop, Lorenzo would sometimes suggest that she weave a rug copying one of the paintings. These paintings, which still hang on the walls of the Hubbell Trading Post, influenced Navajo weaving for many years and are therefore important documents in the cultural history of the Navajo.

Enter Supermarket, Exit Trading Post

In addition to the fact that the post still operates with much of its original equipment in the original buildings Don Lorenzo built, it is historically interesting as the center of life and trade for over 80 years in an important part of the Navajo Reservation. Its extraordinary collection of old rugs, silver, western paintings, and historic documents are invaluable. Of even greater importance, is the fact that the trading post is now a rapidly dying institution. Many traders and others who know the Indian reservations believe the old-time trading posts will be gone altogether in another twenty-five years, replaced by supermarkets.

As the last important example of old-time Navajo trading posts, the Hubbell Trading Post at Ganado, Arizona, may soon become a part of the national park system.

In April, 1959, the Advisory Board on National Parks, Historic Sites, Buildings, and Monuments strongly recommended that the post be acquired for inclusion in the national park system. Subsequently, Senator Carl Hayden and Representative Stewart Udall of Arizona introduced bills in Congress to achieve this end. (See *Parks and Congress* on page *13.*)

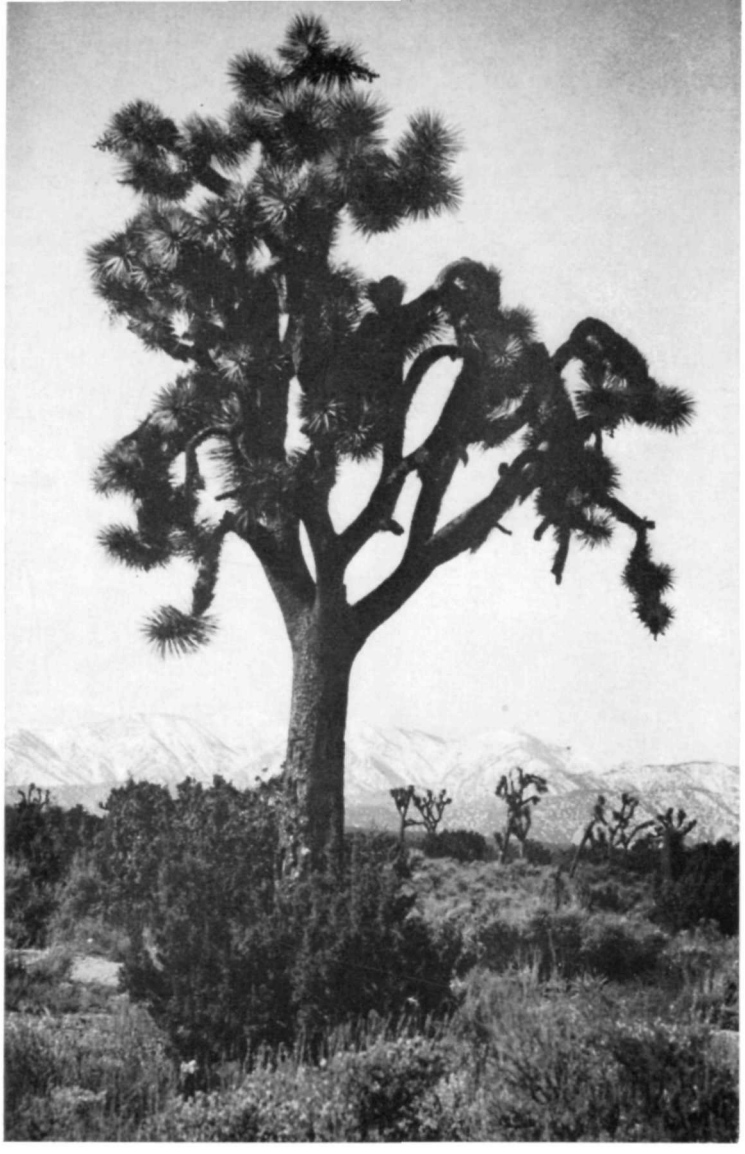
The National Park Service Advisory Board has pointed out in their unanimous recommendation that:

the Hubbell Trading Post expresses a period in history as does no other known existing trading post, and its function as an acculturating agent continues to this day among the Navajo and Hopi Indians, which tribes it has served since its founding in 1876.

The post also includes in its present make-up many intangible elements of feeling and association with important parts of the American heritage. The Spanish element, the American element, and the American Indian element are all well represented. In addition, the examples of Western art preserved at the post are significant Americana and part of the story of trading post life.

The Hubbell Trading Post, if acquired as a national historic site, will be preserved for posterity as a landmark in the settling of the West, and will be an invaluable aid in interpreting to the American tourist the part played by the Indian trader in settling the West. ■

As we go to press, news has reached us of the death of National Parks Association Board member Paul Bartsch. An internationally-known biologist, Dr. Bartsch was 89.—Editor.



Veteran Joshua Tree, 40 feet high.—Photo By Weldon F. Heald

Monument To a Tree

By Charlotte B. Norris

THE MAJESTIC HEIGHTS and distances surrounding Joshua Tree National Monument are props for a stage on which is spotlighted that most spectacular botanical feature of the California high-desert country, the giant Joshua Tree (*Yucca brevifolia*). Largest of the yuccas, this fabulous member of the lily family had fast been diminishing over the years, when, on August 10, 1936, a unit of the national park system was established by presidential proclamation for the preservation of the tree, and named in its honor.

The Joshua tree owes its common name to the Mormons who, during their westward trek in 1846-7, read into its upraised and extended arms an attitude of benediction, a living symbol by which the Prophet Joshua pointed them on to the promised land they were seeking.

Seldom in close ranks, often in open shadeless forests, and frequently as scattered, individual subjects, the Joshuas may be seen all over the lower levels of the monument. Hardy enough to withstand long periods of drought, they can also weather the severe cold of winter.

In April and May, especially if the annual rainfall has exceeded the normal five inches, the meadows surrounding the Joshuas are suddenly swept by a flash-flood of gorgeous, many-colored blooms which washes up among the outcroppings of pinkish-gray granite that have eroded into fantastic castles, towers and archways.

Representing over 500 species of plant life, these wild flowers are momentary, yet the nearby Pinto Basin yields relics of a culture that existed 9000 years ago. Many of the Joshuas also are extremely old. In the absence of annual tree rings, however, it isn't possible to determine their exact age. Since *Y. brevifolia* seldom grows more than one inch each year, the towering 35-40 foot grandfathers may be anywhere from 450 to 500 years old.

Mrs. Norris has combined free-lance writing and homemaking since she and her husband moved from Ohio to California twenty years ago. Her articles about gardens, flowers, and the creatures that are friends or enemies of plants have appeared in *Popular Gardening*, *Flower & Garden Magazine*, and *Horticulture*.

As a locale for outdoor study and recreation, Joshua Tree National Monument has been growing in popularity, until August, 1954 saw the annual tide of visitors reach a new high of 181,451. This is partly due to the unusual accessibility of the monument. Situated in Riverside and San Bernardino Counties, the north entrance is best approached from U. S. Highways 70, 80 and 99 to a point east of Banning, and thence to the lively winter resort town of Twentynine Palms where headquarters are located.

The Sun's Home Year-Round

There are good desert roads with signs warning the motorist to stay on designated routes. This region is the sun's all-year home, a part of the Mojave-Colorado Desert area. A water canteen for each car is a *must*, particularly during the hot summer vacation months.

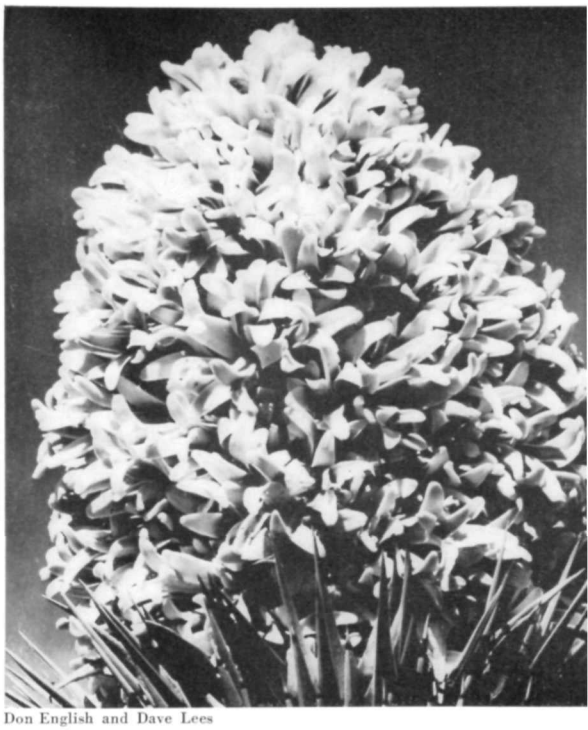
Within the 870-square-mile sanctuary, the elevation varies from 1000 to over 5000 feet. A 26-mile paved road winds upward from Twentynine Palms through a rocky canyon for ten miles before reaching the first of seven campsites with outdoor facilities. Campers must bring their own firewood and water, and no fires are permitted outside the campgrounds. And since the theme is conservation of wildlife, no hunting is allowed—except with cameras. Indeed a camera can be kept profitably busy shooting only the strikingly grotesque Joshua in its many diversified shapes.

Some of the Joshua tree's habits are as weird as its appearance. Until it has bloomed the first time, it doesn't acquire any branches, but remains a single erect trunk clothed in stiff, sword-shaped, toothed leaves up to nine inches in length. When one of these single trunks reaches a considerable height without having bloomed, it becomes topheavy, leans sideways, and gradually sinks to the ground. While it looks defeated, it is not necessarily dead, and chances are that it will soon be sending out gorilla-arm branches at erratic angles.

When the Joshua does bloom, it bears heavy, pointed, 8-14-inch panicles of greenish-ivory florets at the ends of the branches beyond the new bright green leaf growth. Especially at night, these flower clusters become very strongly scented, for it is after dark that they are visited by the Yucca Moth (*Prumba synthetica*). The moths come in large numbers, and fertilize the plant, while making sure of food for their larvae. The moth collects enough pollen in which to wrap a single egg, makes it into a tiny pellet, and pushes the pellet into a floret. Then, having used only a percentage of the bloom, it flutters away when daylight comes.

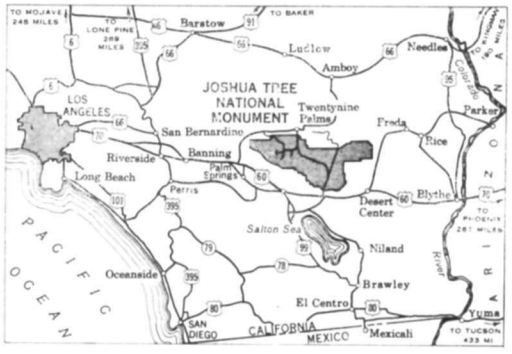
As a setting for the Joshua, or tree yucca, numerous botanical neighbors may be seen from the road or from the self-guiding foot trails of the monument. Among the hundreds of species are nolina with its remarkable tall feathery plumes, flanked by ruddy twisted manzanita, spreading liveoak, pinyon, and juniper. There are patches of ocotillo where a lizard may sunbathe at the tip of one of the tall, graceful, thorny stalks. The fragrant flowers of desert willow attract bees.

Showy, silvery smokethorn has a tap root which may probe fifty feet underground in its search for water. There is mesquite whose beans once furnished the Indians with meal. Stands of Washingtonia palms set fixed, formal fans against the sky, and indicate an oasis. There are Cholla gardens—elsewhere, cattlemen burn off their numerous thorns with a blow torch when grazing becomes scarce. Holly shows in a few isolated spots. And there are small bushes whose twigs break as easily as icicles; annuals galore, peren-



Don English and Dave Lees

The 8- to 14-inch long Joshua tree panicle bursts forth in spring from ends of branches.



As shown on the map above, the monument is located some 150 miles east of Los Angeles. Pinto Basin, below, in the eastern section of the monument, is famous for a particular type of stone weapon found there—a relic of prehistoric man.

National Park Service photo by George A. Grant

Joshua Tree National Monument

A flash-flood of brilliant springtime wildflowers surrounds a young Joshua tree. The youngster will not grow branches until after it has bloomed the first time. Little San Bernardino Mountain Range in the background.

nials, too; and all over the levels flows the dark green sea of the common creosotebush.

Fossil Camels and Pictographs

Rock formations representing eight geological ages are found in the vicinity, and a prehistoric lake which once covered Pinto Basin now yields the fossilized bones of camels, horses, antelope, and the ground sloth from its dust-dry shores. In addition, a more recent civilization has left behind examples of Indian pottery, arrow points, and pictographs.

The Joshua's wildlife companions include the usual types of desert animals. The most dramatic of the larger mammals is the Bighorn Sheep (*Ovis canadensis*) which inhabits the rocky formations, but is occasionally glimpsed by hidden spectators as it takes its twice-weekly drink at Stubby Spring or a similar waterhole. There are mule deer, bobcat, badger, desert fox, and infrequently a mountain lion.

Small rodents range from the widely known jackrabbit, whose long slow bounce carries him over an incredible distance in a short time, to the silky pocket mouse who is distinguished as being one of the smallest mammals in North America. Among the reptiles, the desert tortoise (*Testudo aggassizi*) lives to a grand old age because he knows how to take life easy. Small lizards dart about in the sand, while the largest, the chuckwalla, lives among the rock formations. Birds are plentiful, especially around the oases. Of the more than 155 species, most of them are migrants.

The road inside the sanctuary ends at Salton View in the Little San Bernardino Mountains. From an elevation of 5185 feet, the view can be thought of only in superlatives. To the southward, the bright, electric atmosphere sharpens to a glitter the surface of thirty-mile distant Salton Sea lying 241 feet below sea level. Infinitely remote, but clearly suspended in space rears the head of Signal Mountain, ninety miles away in old Mexico. Close at hand, right down in front of the spectator, lies the orderly luxuriance of Coachella Valley's famous date gardens and grapefruit groves, skirted by the San Andreas Fault. To the right, looms 10,831-foot San Jacinto Mountain, while still further to the north, snow-capped San Gorgonio proclaims its 11,485-foot peak to be the highest point in Southern California.

Joshuas Survive Indian Burning

Returning by one of the remote foot trails, a visitor may sometimes spy a standing Joshua with a partially burned fifteen-foot trunk whose ascending branches still show new leaf growth. The charred condition hearkens back to a time prior to 1913 when the Serranos, a branch of the Shoshone tribe of Indians, roamed the region. In those days, legend has it, each Indian picked out a giant Joshua which he called his own. When the owner of the tree died, other Indians of the tribe

Teddy bear cholla cactus near the head of Pinto Basin. A wide variety of desert wildlife species—including bighorn sheep, mule deer, bobcat, badger, and desert fox are occasionally glimpsed by visitors to Joshua Tree.

National Park Service photo by George A. Grant

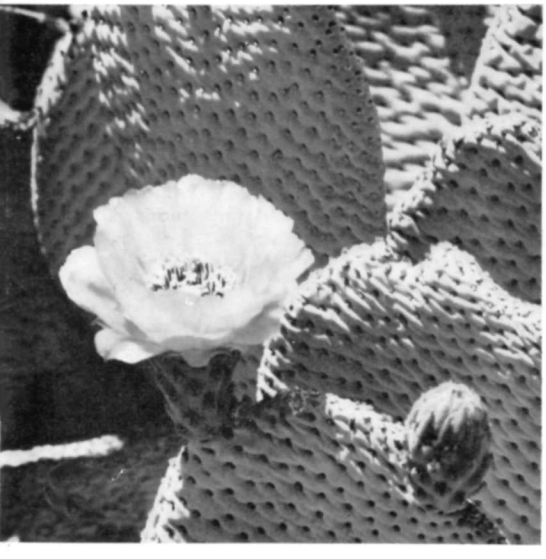
set fire to his tree so that the smoke accompanying him to the Happy Hunting Grounds might shield him from the hot desert sun *en route*. However, most of these trees, clamping the earth with tenacious primeval roots, refused to join their owners in death.

Instead, they preferred to go on propagating themselves by seeds and by underground runners, furnishing nesting places for birds, and offering seeds for food. For each spring after the Yucca Moth has taken what it wants, there still remains an abundance of florets to develop seedpods, with about one hundred seeds to a pod. Primitive man ground the seeds into meal; more recent Indians ate the swelling flower buds for the high sugar content; and modern man manufactures attractive novelties from the patterned dry, porous woody structure of the branches. So, in addition to being the most distinguished botanical grotesque of the high desert country of Southern California, the Joshua tree is also one of the most useful of desert plants.

It was therefore truly in the interests of the people, present and future, that a portion of its natural habitat was set aside to protect this twisted, scarred, but triumphant Joshua tree; and it is fitting that the sanctuary thus established should be known as Joshua Tree National Monument. ■

Beavertail pricklypear cactus is one of the many that bloom in spring in the desert gardens.

National Park Service



Parks and Congress

C & O Canal National Historical Park

H.R. 2331 (Foley). Expected to be acted upon by the House the week of April 25.

Cape Cod National Seashore

S. 2636 (Kennedy and Saltonstall) and *H.R. 9050* (Keith). Department of Interior report expected momentarily. Sponsors have requested the Senate Interior Committee to hold Washington hearings at an early date after receipt of the report.

Hubbell Trading Post National Historic Site

H.R. 7279 (Udall) and *S. 1871* (Hayden). To authorize the establishment of the Hubbell Trading Post National Historic Site in Arizona. *H.R. 7279* defeated in the House. *S. 1871* pending with the Senate Interior and Insular Affairs Committee.

Multiple Use of Forests

S. 3044 (Ellender), *H.R. 10465* (Staggers) and 40 others in the House. Makes it a policy of Congress that national forests are established and administered for outdoor recreation, range, timber, watershed and wildlife and fish purposes. The Secretary of Agriculture is authorized to develop and administer renewable surface resources of the national forests for multiple use and sustained yield. Approved by House Committee.

This bill is interpreted by some conservationists as a move to circumvent current efforts to establish national parks on a few outstanding national forest lands. Public hearings conducted by the House Committee on Agriculture record some witnesses urging that wilderness be specifically listed as one of the multiple use purposes of the bill.

North Cascades National Park Study

S.2980 (W. Magnuson), *H.R. 9360* (Pelly) and *H.R. 9342* (D. Magnuson). Authorizes the Secretary of the Interior in cooperation with the Secretary of Agriculture to make a comprehensive study of the scenic, scientific, recreational, educational, wildlife and wilderness values of the North Cascades region in Washington. Interior and Insular Affairs Committee sources anticipate difficulty in getting departmental reports because of multiple use bills under consideration.

Padre Island Seashore Park

S. 4 (Yarborough). To establish a seashore park in the coastal area extending from Corpus Christi to near Brownsville, Texas. Printed hearings released recently show overwhelming favor for this measure, although some opposition expressed by landowners.

Point Reyes National Seashore

S. 2428 (Engle), *H.R. 8958* and H.R. *10519* (Miller). To set aside a national seashore in Marin County, California. Preliminary reports on hearing held at Kentfield, California on April 14 indicated that some 40 witnesses were in favor of the proposed seashore. Nine dairymen and a sports club owner expressed opposition. National Park Service offers to either lease-back dairy rights or purchase scenic easements were not acceptable to dairy ranchers.

Rainbow Bridge Protection

S. 3180 (Moss). To amend the Colorado Storage Project Act with respect to the protection of national parks and monuments. (See April 1960 *Parks and Congress.*) Hearings for outside witnesses on Bureau of Reclamation projects including Rainbow Bridge protective dams were completed by the Public Works Subcommittee of the House Appropriations Committee in mid-April. Similar hearings will be conducted by the corresponding Senate Committee at a later date.

Richard L. Neuberger National Seashore

S. 3211 (Mansfield and Kuchel) and *H.R. 11204* (Porter). Provides for the establishment of the 26,000 acre Richard L. Neuberger National Seashore on the Oregon Coast in honor of the late Senator. A revised version of Neuberger's own bills, *S. 1526* and *S. 2898* (the substitute drafted by the Oregon Governor and state natural resources committee).

Sawtooth Mountains Study

S. 3353 (Church). To provide for a study and report to Congress on the advisability of establishing a national park in the Sawtooth Mountain region of Idaho.

Wilderness Bill

H.R. 10621 (Miller) Essentially the same as revised *S. 1123* but with the additional provision that 15 years after its enactment, additions to the Wilderness System can be made only by Congress. *S. 1123*, in its version known as Committee Print No. 3, awaits approval by the Senate Committee on Interior and Insular Affairs. Its provisions are generally approved by the Secretaries of Agriculture and Interior. This version of the bill is also supported by many national, state and local conservation organizations throughout the nation.

Opponents of wilderness legislation seek further amendments and substitution of new language for major portions in order to modify protective features and delay action. Prominent opponents or amenders of the bill in recent months have been Senators Joseph C. O'Mahoney of Wyoming and Gordon Allott of Colorado.

Noting that the matter has been under consideration three years, Senator Kuchel, the Republican assistant leader from California, asked Chairman James E. Murray of Montana in late March to schedule quickly a "decisive vote" on the bill.

Conservation News Briefs

Advisory Board Recommends Parks

Early enactment of legislation to establish the Chesapeake and Ohio Canal National Historical Park, and designation of a Missouri area as Ozark Rivers National Monument were two of the major recommendations of the Advisory Board on National Parks, Historic Sites, Buildings and Monuments which met in Washington, D. C. March 21-23.

In addition, the Advisory Board commended the efforts of the Department of the Interior to secure the cooperation of Congress in providing essential protection of Rainbow Bridge National Monument, Utah against damage that would result from the construction of Glen Canyon Dam.

The eleven-man board, which submits its recommendations to Secretary of the Interior Seaton, supported the position of the National Park Service with respect to zoning Yellowstone Lake, and recommended that the three lower arms of the lake—amounting to one-fourth of the lake—be closed to power boats.

The advisory group also commended the Park Service for its seashore and Great Lakes shore surveys and urged that the findings of the surveys be made available to other agencies and the public as early as possible.

Bridge Canyon Hearings

The Federal Power Commission has scheduled hearings on conflicting applications by the City of Los Angeles and the Arizona Power Authority proposing construction of hydroelectric projects on the same stretch of the Colorado River. Hearings in Washington, D. C. will begin on September 12.

Both projects propose a development at Bridge Canyon, Arizona, a location which in recent years the Bureau of Reclamation has also considered for the building of an 1876-foot reservoir. The height of the Bureau of Reclamation reservoir would flood the entire Grand Canyon Monument and 18 miles of the park.

Bills recently introduced in the House of Representatives propose dams of the same height at Bridge Canyon. The Arizona Power Authority and City of Los Angeles proposals specify dams storing water to the height of 1610 feet which would back water just to, but not across the boundary of the monument. (See NATIONAL PARKS MAGAZINE, March 1959, p. 13, March 1960, p. 14).

Sawtooth Mountain Park Study

Senator Frank Church of Idaho has introduced a bill proposing study of the Sawtooth Wilderness area in Idaho for possible establishment of a national park. The Senator wrote in a recent newsletter to his constitutents: "There is no scenic grandeur anywhere in the United States that excels the jagged summits of the Sawtooth Mountains." He added that the Sawtooth ridgelands in central Idaho are nearly all Federal lands unsuitable for grazing and lumbering, and no mining concerns are operative.

Spokesmen for livestock, timber and mining interests, however, have expressed opposition to a study of the Sawtooth area. In a letter to Senator Church, Secretary of the Idaho Mining Association A. J. Teske has stated that the Sawtooth Area is one of Idaho's

> brightest prospects for future mineral production. It also includes valuable timber and grazing resources. Setting such an important economic asset aside as a national park, or in effect, locking it up for the sole purpose of recreation and preservation of scenic beauty would seriously handicap the economic development of the state.

Senator Church has polled Idaho residents about his proposal with the result that approximately 78 percent of those responding are in favor of a study of the area and some 22 percent are opposed.

Alaska Conservation Society

The Alaska Conservation Society was recently formed "to secure the wise use, protection, and preservation of the scenic, scientific, recreational, wildlife and wilderness values of Alaska." Regular $3 membership in the non-profit organization is open to all residents or property owners of Alaska and $2 associate membership is open to non-residents.

The address of the new group is Box 512, College, Alaska. Leslie A. Viereck, National Parks Association member since 1956, is president.

Park Land at Great Falls

An 800-acre tract of historic woodland near Great Falls, Virginia, has been leased by the National Park Service from the Potomac Electric Power Company to be administered by the National Capital Parks. Officials of both the National Capital Planning Commission and the National Park Service consider the tract the most important area along the palisades of the Potomac still in private ownership. The area contains the remains of some of the original skirting canals of the historic Potomac Canal Company organized by George Washington in 1785.

The 50-year lease signed by the Secretary of the Interior and Pepco President R. Roy Dunn gives an option to purchase of the land at appraised value any time during the term of the agreement if Congress so authorizes.

Land for Sale at Joshua

Private inholdings within the national parks and monuments continue to plague the National Park Service with a variety of problems. An ad in the March 4, 1960 *Desert Sun* of Palm Springs, California, offers to sell 1080 acres of private lands within the boundaries of Joshua Tree National Monument, California for $330 an acre. What would be done with this land by private owners is open to speculation, but only one action would be beneficial to the monument—donation of the private land to the National Park Service.

There are more than 50,000 acres of privately owned lands in the whole monument interspersed among about 510,000 acres of government-owned land. The Park Service states:

> There is a creditable history of exchanges of private lands within the Monument for public domain lands outside of the monument. . . . Unfortunately for the sound administration and protection of the Monument . . . the annual appropriations received by the National Park Service for the purchase of private holdings are not sufficient to acquire all private property in the parks and monuments with dispatch. There are very few areas administered by this Service that do not contain varying amounts of private land that we are anxious to acquire. . . .
>
> The needs of other areas in the national park system have been so pressing that we have not been able to allot more of our limited land acquisition funds to Joshua Tree National Monument.

The 1959 Annual Report of the De-

partment of the Interior tells of some 78,186 acres of national park system inholdings (non-federal land) acquired in twenty-one areas in the park system during the fiscal year by purchase, donation, transfer or exchange. Some 250,307 acres of inholdings still remain within the twenty-nine national parks, and 145,000 acres remain in the national monuments.

An inquiry of the Park Service reveals that private individuals, non-profit organizations, associations and corporations can help with this problem by donation of specific tracts of land within units of the national park system or by donation of funds to the Park Service for purchase of lands. The Park Service has authority under which any land purchased by an individual can be accepted by the Service as a donation.

Persons desiring to help in this matter would benefit by contacting the Park Service for help in securing an appropriate appraisal of the lands in question. Otherwise, greatly exaggerated prices may be paid for land of relatively low value.

Arctic Wildlife Range Film

The 1956 expedition into the eastern Brooks Range of arctic Alaska led by National Parks Association Trustee Olaus J. Murie has been recorded on color film by wildlife photographer H. Robert Krear. A 9-minute documentary, *A Letter from the Brooks Range*, is narrated by Dr. Murie and his wife, Mardy. It includes scenes from the glacial valley of the Sheenjek River, a caribou migration crossing the river plain, shots of ptarmigan, ground squirrels, grizzly bears, and a display of Arctic wildflowers. Copies are available from the Conservation Foundation, 30 East 40th Street, New York 16, New York. Price, $40.

A longer color film by Mr. Krear (20 minutes) based on the Murie expedition is the *Arctic Wildlife Range*. It is available from Thorne Films Inc., 1229 University Ave., Boulder, Colorado, for $200. (Rental, $10/day, $20/week.) Both films are 16 mm.

Missouri Prairie Land Saved

The Missouri Conservation Commission has acquired 1440 acres of prairie land, 1000 of which are unbroken. *Nature Conservancy News* reports that this area, which is 60 miles from Kansas City in Taberville, is marked by sandstone outcroppings, a post oak grove, waving grasses and wide spaces. Managing this area for prairie chickens should insure the preservation of the land intact. Although present landowners have use rights until 1960, none of the virgin prairie will be broken.

International Union To Meet

The Seventh General Assembly of the International Union for Conservation of Nature and Natural Resources will be held from June 15 to 24 in Warsaw and Cracow, Poland. The Eighth Technical Meeting of the International Union will be held during this same period. The Technical Meeting will center upon the impact of man and modern technological development on nature and natural resources.

Hetch-Hetchy Wasn't Enough

Further impairment of the scenic, water and wildlife resources of Hetch-Hetchy Valley in Yosemite National Park is imminent. San Francisco wants more power.

In an application for a land-use permit now pending before the Bureau of Land Management of the Department of the Interior, San Francisco hopes to divert nearly all of the Tuolumne River below O'Shaughnessy (Hetch-Hetchy) Dam—including some seven miles within Yosemite National Park—into a tunnel which would maintain a high elevation until it reaches a place known as Early Intake, where it would be dropped from a high head for generation of electricity. In addition to being in opposition to all national park principles, such diversion would destroy fish life and seriously damage camping and fishing values of this section of the park.

In a late April 1960 letter of protest to BLM Director Edward Woozley, the National Parks Association raises the question of whether San Francisco has any remaining rights to the use of the valley waters after forty years have passed since the building of O'Shaughnessy Dam. A more complete report on this matter will be carried in the June issue of NATIONAL PARKS MAGAZINE.

Summer Outdoor Programs

Workshop on school camping and outdoor education, Antioch College and Miami University, Yellow Springs, Ohio, June 20 to July 23. Six credit hours for advanced students, teachers and administrators. Write to Jean R. Sanford, Antioch Outdoor Education Center, Yellow Springs, Ohio; or Robert Finlay, Conservation Education, State Office Building, Columbus 15, Ohio.

Nature consultants at Girl Scouts of the U.S.A. summer camps. Women may write Miss Fanchon Hamilton, 830 Third Avenue, New York 22, New York, or contact local Girl Scout Councils for information concerning local area camps.

Ansel Adams' Photographic Workshop sponsored by Best's Studio, Yosemite Valley, June 10 to 18. Basic techniques of mountain photography, interpretation of natural scene, esthetics, philosophy. Write to Best's Studio Inc., Box 455, Yosemite National Park, California.

Mountain Leadership Workshop sponsored by Appalachian Mountain Club, Pinkham Notch Camp in the White Mountain National Forest, Gorham, New Hampshire, June 16-21. For camp trip counselors, scout trip leaders, group climbing leaders. Write to Mountain Workshop, Appalachian Mountain Club, 5 Joy Street, Boston 8, Massachusetts.

Natural Resources Institute, Oregon State College, Corvallis, Oregon, June 20 to August 12. For teachers of all levels, 12 credit hours in fields of conservation, physical and resource geography. Write to Department of Natural Resources, Oregon State College, Corvallis, Oregon.

The Editor's

Bookshelf

BIS ZUM LETZTEN WILDWASSER (To the Last Wild Waters) by Otto Kraus. Dr. Rudolf Georgi Press, Aachen, Germany. 44 pp. 23 photographs. (Text in German.)

Effective protection of scenic lakes, streams and waterfalls against irreparable damage wrought by hydro-electric power developments calls for the application of sound planning on an international scale. Thus concludes Professor Otto Kraus, one of Europe's most discerning conservationists, in this latest treatise.

"Great masterworks of Nature—in the final analysis—are the property of *all* mankind," he argues. Their preservation has been the common objective of like-minded organizations in many countries. By pooling their efforts, and transcending national interests, a major contribution can be made toward nature preservation, and coincidentally, toward better international understanding.

Professor Kraus suggests the International Union for Conservation of Nature and Natural Resources (I.U.C.N.) and such specialized agencies of the United Nations as UNESCO and FAO, as likely organs to marshal the weight of world public opinion and carry on the fight for nature preservation in close co-ordination with national efforts.

To Professor Kraus, wilderness protection is a matter of international, not merely national concern. His activities in this field have taken him from his office at the Bavarian Department of the Interior halfway across the globe to Berkeley, California, where he attended a Sierra Club Wilderness Conference. He is conversant with wilderness problems peculiar to *any* region, be it Lapland, Turkey, Italy or his own Bavaria.

He does not deny that some of his objectives may be termed "visionary." But, argues Professor Kraus, recent technological progress has brought into the realm of practicability entirely new sources of energy which may spare the "last remaining wild waters" from the menace of needless intrusion by ill-conceived hydro-electric power projects.

The author makes an eloquent plea for weighing carefully the irreplaceable aesthetic values inherent in untouched mountain lakes, streams and falls against the relatively short-lived economic gains derived from destructive hydro-electric power developments. He warns that the time is rapidly approaching when nuclear reactors will become the world's most common source of electrical energy. "We are no longer at the threshold of the nuclear age—we have entered it. The large-scale use of nuclear energy for peaceful purposes is merely a matter of time now," declares Professor Kraus.

On the general subject of hydro-electric power developments he asserts "experience has shown that nearly everywhere can these projects be undertaken without encroaching on scenic resources. Conservationists are not against hydro-electric power plants *per se*, but are merely fighting to keep them out of critical areas." He proceeds to give an illuminating account of some of the victories and defeats of a post-war popular resistance movement in Germany, Austria, Switzerland, France, Italy and elsewhere—a movement in which one suspects the author was more than an idle spectator. He describes how in one case, 185,000 signatures were obtained for a single petition involving a proposed Black Forest power project. This movement, Professor Kraus estimates, encompasses over 800,000 spirited nature lovers. Many of them are villagers fighting for the preservation of cultural values which have become an integral part of their very lives. Others are drawn from such diverse segments of the population as the teaching profession, government officialdom, scientific organizations and outdoor clubs.

One gathers that this popular movement, at best, succeeds in putting out fires—and only after a costly expenditure of great effort and personal sacrifice. A far more efficient method, argues Professor Kraus, would be to reach agreement on the areas in the world that should be permanently exempt from the encroachment of hydro-electric power developments, and having them declared "terra sacra" by the national governments concerned.

—*William J. Owen*

A Quick Glance at . . .

OUR FOURTH SHORE: Great Lakes Shoreline Recreation Area Survey. U. S. Department of the Interior, Washington, D. C., 1959. 48 pp. Illus.—The findings and recommendations of a National Park Service Survey of the Great Lakes Shoreline. One of many fine maps pinpoints undeveloped areas of potential national seashore significance.

CONSERVING WILDLAND RESOURCES THROUGH RESEARCH, Introductory Report from the Wildland Research Center, University of California Agricultural Experiment Station, Berkeley, 1959. 64 pp. Illus.—Some basic facts about California wildlands and their resources. Outlines some of the major wildland problems in the state and the needs in wildland research. Many maps, graphs and photographs.

OUTDOOR RECREATION RESOURCES REVIEW COMMISSION: What it is and does, Washington 25, D. C., 1960. 18 pp.—Basic purposes, organizational structure and responsibilities of the Outdoor Recreation Resources Review Commission.

OUTDOOR RECREATION RESOURCES REVIEW COMMISSION, Proceedings of the Second Joint Meeting with its Advisory Council. Washington 25, D. C. 1960. 132 pp.—Progress report given to Council members, policy questions presented to them, and verbatim reports of discussion groups and comments from full meeting on these questions. Meeting was held January 25-26, 1960.

Your NPA at Work

Zion Road Proposal

In a February letter to Director Conrad L. Wirth of the National Park Service, Executive Secretary Anthony Wayne Smith urged a highlands approach to the problem of providing access to the Kolob-La Verkin Creek Section of Zion National Park, Utah. This section now has only a few unpaved county and private inholding access roads and fire lookout roads in the highland areas and no roads in the spectacular wilderness finger canyon country to the east of Hurricane Cliffs.

Park Service Mission 66 plans call for a highway interchange on Route 91 at Taylor Creek in the northwest corner of the park, with a surfaced road running east up Taylor Creek, generally following the present trail to the junction of Taylor Creek and the South Fork. Then it proceeds south over Lee Pass and down Timber Creek to its junction with La Verkin Creek; then east up La Verkin Creek to the mouth of Kolob Arch Canyon. While not officially included in the Mission 66 proposal, there is general discussion of a road down Hop Valley to connect with the La Verkin Creek route to make a through road.

The Association's letter, sent to cooperatively offer its thinking during these preliminary stages of the Zion road planning program, suggested that these bottom-of-the-valley routes "would be unwise from the point of view of both park preservation and access. . . . This La Verkin and Hop valleys area is beautiful scenic wilderness country if preserved in its present condition with access by foot or horse."

The Association suggested two possible alternatives to the present Mission 66 proposal:

(1) that the road turn northeast at the confluence of the South Fork and rise into the lava beds around Horse Ranch Mountain and up to the road which leads into the Park from the north to Death Point. Then at this juncture, continue eastward and eventually south to the presently existing road running north and south through Little Creek Valley to connect with the unpaved road system in the Firepit Knoll and Spendlove Knoll region; or

(2) that rather than bringing the road up from Route 91 through Taylor Creek, bring it in along the line of the present road which leads from Route 91 to Death Point, or perhaps up Spring Creek just north of the present boundaries of the park.

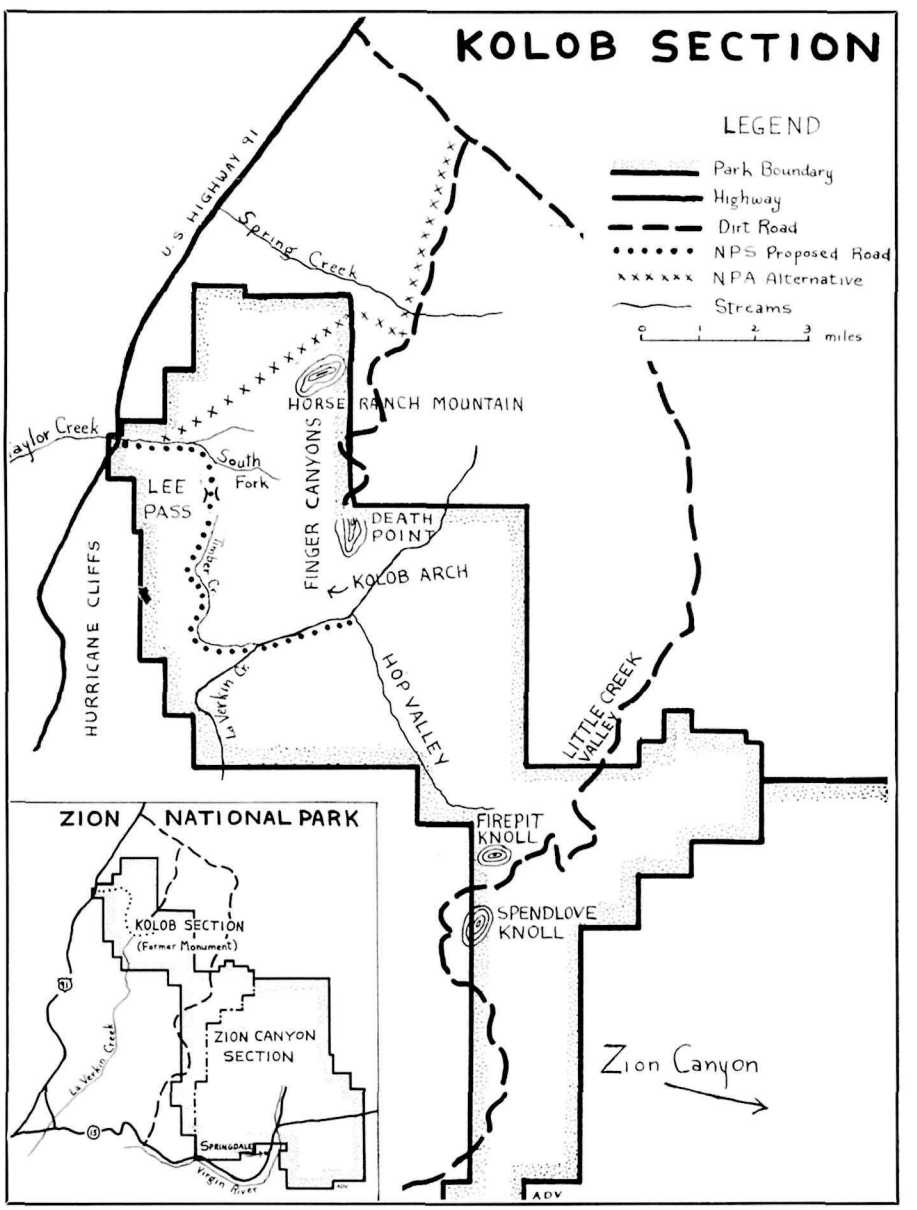
The Association letter indicates that the "highlands approach . . . has great advantages in offering abundant campground opportunities and magnificent views of the canyon country from many points. It is also cooler and more comfortable in the summer." And perhaps most importantly, "There is easy access to this country from many points by trail and it would seem to us that a plan of management oriented around scenic and wilderness protection should look toward the retention of these valley bottoms in their present natural condition."

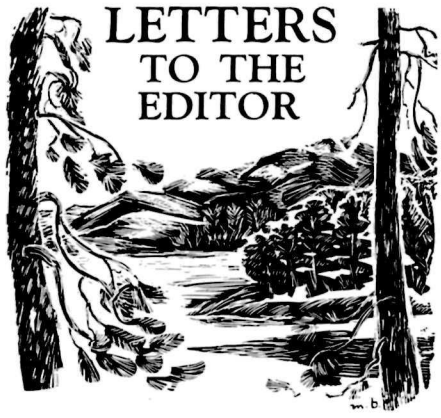
In his reply, Acting Director Scoyen of the Park Service stated:

Little physical development of this sector has been accomplished as yet and the construction program included in the Mission 66 schedule includes only the projection of 4½ miles of road access from U. S. 91 to Lee Pass in fiscal year 1963. Although the General Road Development section of the Master Plan indicates further construction as a post-Mission 66 project, there are so many factors that still need to be studied such as private inholdings, stock driveways, existing county and private roads, that we are not in a position to discuss details of routes at this time.

As of now we believe a road system of minimum proportions should include access from U. S. 91 at Taylor Creek through Timber Creek to La Verkin creek to the site of the proposed campground. This will bring to view the natural beauty of the Finger Canyons and the Kolob Plateau.

Park Service road proposal and NPA alternative, Zion National Park, Utah.





Wants Photographs

I have seen so many striking photographs in your issues that I am tempted to ask if it would be possible for this office to have prints of some of the magnificent scenery for use in our Recreation Department Administration Building.

JOSEPH E. CURTIS, COMMISSIONER
Department of Recreation
White Plains, New York

• We do not keep all photographs on file in the editorial offices, but if you specify certain ones, we can tell you where to obtain prints.—*Editor.*

Mining in Death Valley

While visiting Death Valley National Monument in 1958 we picked up the information that no more commercial mining (referring specifically, I believe, to borax) was allowed in the National Monument, and that this is the policy followed in all national parks and monuments. If this is true, as it should be, how is it that, as the enclosed clipping states, "at least four companies are drilling test holes"? Why should these companies be allowed to mar the wild beauty of the valley or its canyons with their mechanical monsters, to say nothing of the horrible shacks or shanties that usually accompany such ventures—later left, together with other debris, to scar the landscape? Is it not the purpose of the national parks and monuments to preserve the particular areas so designated in their natural beauty and condition, which would include the barring of commercial ventures such as these?

EVELYN E. ARMITAGE
Williamsville, New York

• Death Valley Monument is one of five units in the national park system where mining is permitted. The special law which permits mining in the monument gives the Secretary of the Interior considerable control over the operation of any patents, and as a consequence there have been no patents, and the companies have confined themselves to the operation of claims. This means that they must keep their claims alive, and do not acquire any actual title to the land.

The Secretary of the Interior has announced that he contemplates withdrawal of some 35,000 acres within the monument for special purposes; these withdrawals would involve sites of particular archaeological, scenic, scientific or historical interest. They are scattered throughout the monument in small areas.

It is expected that the Bureau of Land Management will hold hearings on these proposed withdrawals in the not too distant future. People who favor the protection of as much of the monument as possible against mining will have an opportunity to submit statements and even to give personal testimony in the hearings. NATIONAL PARKS MAGAZINE will announce the hearings in plenty of time for such participation.

We greatly appreciate your calling this matter to our attention.

Anthony Wayne Smith
Executive Secretary

Shrine of Ages

I should be greatly interested to know if public opinion has been strong enough to prevent the erection of that monstrosity—the Shrine of Ages. To thousands of us who have stood in silent and reverent awe on the edge of the Grand Canyon and gazed down and across its sublime and unspoiled beauty, such a building would seem like a profanity and utterly abhorrent. The Grand Canyon needs no such work of man to enhance it.

ALICE F. HOWLAND
Milton, Massachusetts

• There has been no building action thus far. We'll keep you posted through news briefs, editorials, and the "NPA at Work" column.—*Editor.*

Mississippi National Park?

I wonder if anyone has considered the lower Mississippi as a park or monument? Below Memphis it seems to me that some of the meanders would be most interesting to be preserved in order to watch the changes that take place as they are formed, cut through, and partially filled up, forming islands and crescent-shaped lakes. The swampy, flood-plain wildlife is unusual, too.

Another Mississippi area that I believe would make a good park or monument is the outer beaches, islands, and marshes of the Delta. These two spots are examples of a certain type of large river, of which there are few in the world.

MRS. R. L. STEVENSON
Winston-Salem
North Carolina

Comment and Query

Our family has certainly enjoyed the recent articles on Kilauea Volcano and the earthquake in Montana last summer. We vacationed for ten days on the shore of Hebgen Lake just two weeks prior to the earthquake.

In the March 1960 issue you mention that H. Raymond Gregg is the author of *A Visitor's Guide to Rocky Mountain National Park.* Can you tell me where a copy of this book may be purchased?

F. J. MINARD
Lincoln, Nebraska

• Mr. Wayne Bryant, Secretary of the Rocky Mountain Nature Association, informs us that the supply of this book is exhausted. A list of other publications about the park may be obtained by writing to him in care of the Association at Estes Park, Colorado.—*Editor.*

Wildland Problems in Austria

Enclosed please find a clipping from an Austrian newspaper to show you that other countries also have the same wildland problems as we have. Austria is a much smaller country than ours, with a population of only seven million. It depends a great deal on world tourism for much-needed foreign currency. But when Swiss and American capital tried to invade the one remaining wilderness territory, the Dachstein Mountains, with *autobahns*, cable cars and ritzy hotels, and probably motels and sunbeaches, all lovers of the out-of-doors got up in protest.

A little moral lift and encouragement from our side would be appreciated by them I am sure.

EDWARD PETRIKOVITSCH
St. Louis, Missouri

Unsilent Night

Last summer at Many Glacier Hotel we were forced to listen to a variety of music which I never allow in my house, and this to an hour much later than is consistent with arising in time to see any of the bird life of the area. If this hotel feels that it must provide entertainment for its employees and guests, it should arrange such noises in a portion of the building where they will not disturb those who do not wish to participate.

MARGARET LOUISE HILL
Austin, Texas

NATIONAL PARK SERVICE

Great Lakes Seashore Recommendations

The following are thirteen specific recommendations found in the National Park Service's 48-page report, Our Fourth Shore—Great Lakes Shoreline Recreation Area Survey, *published early in 1960. Copies of this report may be obtained from National Park Service, Region Five Office, 143 South Third Street, Philadelphia 6, Pennsylvania.*

1. The shorelines of the Great Lakes, like those of the Atlantic, Pacific and the Gulf coasts, are such a valuable segment of our national heritage, that representative sections of them should be accessible to all the people. It is recommended that 15 percent in public ownership be considered an absolute minimum. In certain places, particularly around large centers of population, this should be increased to 20 percent or more.

2. In addition to those areas noteworthy for their scenic or active use potential, swamps and marshlands should have high priority for public acquisition. Although many such areas may not be directly used or even seen by humans, their usefulness as resting grounds and nesting areas for migrating birds will be appreciated everywhere.

3. As natural areas gradually disappear from the scene, examples of outstanding biotic communities become more valuable for appreciation of our natural heritage and grounds for scientific study. Unique examples such as Mentor Marsh in Ohio and Tobico Marsh in Michigan, remaining today, should be preserved for tomorrow.

4. Representative examples of our cultural history, such as Fayette, Michigan, should be preserved so that our progress can be noted, so that past exploits can be commemorated, so that citizens of tomorrow can appreciate the pioneers of yesterday. Museums, each devoted exclusively to a particular phase, might be established at sites where, if possible, physical remains create a tie with the past.

5. Considerable public shoreline properties are presently devoted to maintaining safety on the waters or security of our national way of life. If and when Coast Guard installations or military reservations become surplus to existing needs, conversion to public recreation should be given first priority.

6. Because of access limitations, offshore islands will probably be the last bastions against the onslaught of intensive development. Now, while man's intrusive influences on natural values are still at a minimum, action should be taken to acquire South Manitou Island and others for unspoiled settings and biotic laboratories of the future.

7. One of the fastest growing recreation use demands on the Great Lakes is for additional pleasure boat mooring facilities—especially around Detroit. Although a thorough study of this problem was not possible within the time limits of this type of survey, it is recommended that provisions be made where such uses will not conflict with existing natural values.

8. Except where outstanding scenic, scientific or recreation values are involved, first consideration should be given to acquisition of potential recreation shoreline near centers of population like Cleveland, Detroit, Chicago and Milwaukee.

9. Although the primary objective of this Survey dealt with the inventory of remaining undeveloped areas, attention was given to recreation shoreline that has already "vanished." Consultation with various metropolitan planning organizations revealed an acute awareness of the problems and sound plans for improvement. It is highly recommended that current planning for creation of additional shoreline recreation space around metropolitan areas be given every consideration.

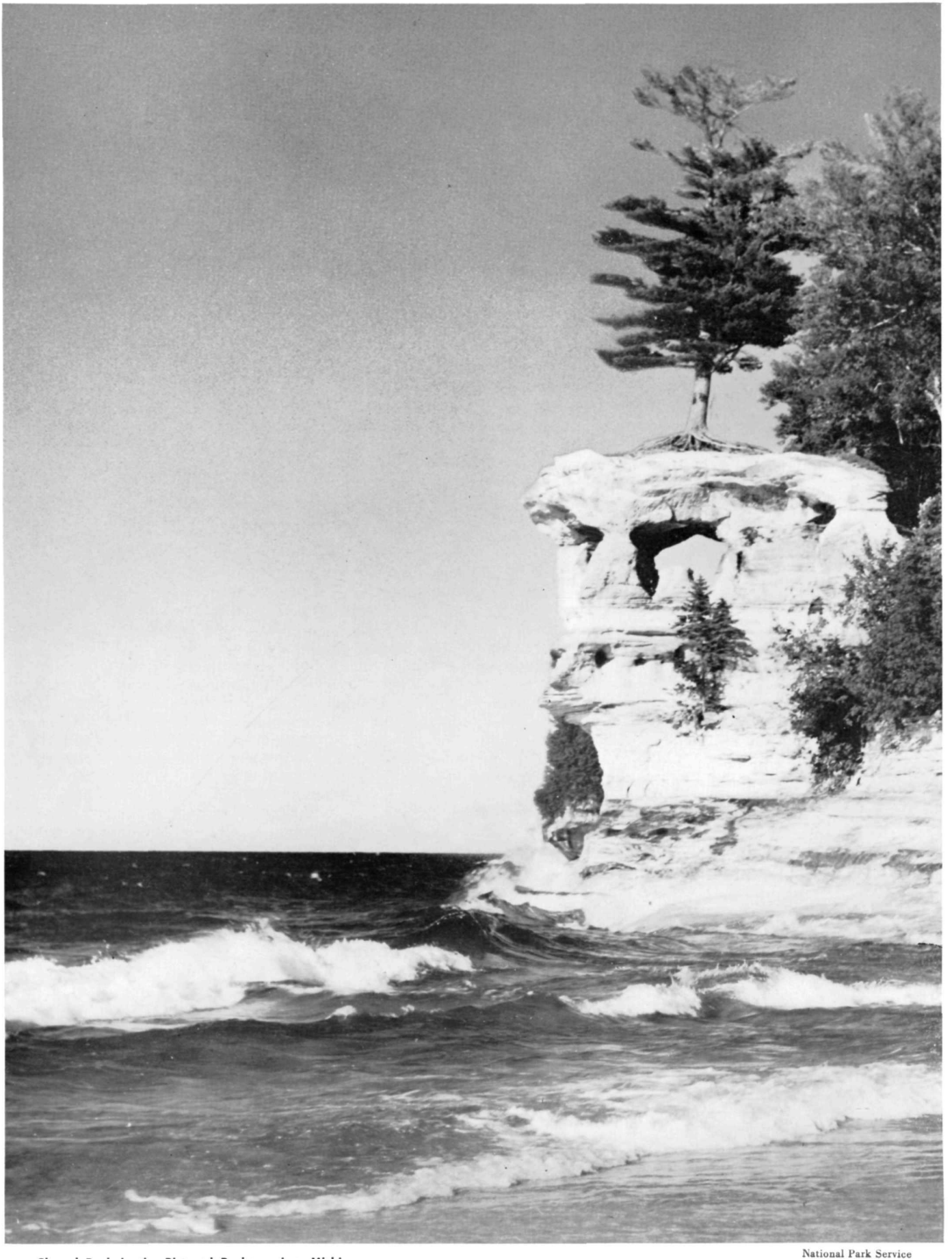
10. The advent of the St. Lawrence Seaway has increased industrial demands for Great Lakes frontage—especially for new harbor space. Responsible planning groups should carefully evaluate long-range recreation needs and select port sites where a minimum effect on recreation values would occur.

11. Outstanding scenic highways such as Minnesota's North Shore Drive and U. S. Highway No. 2 along the south side of Michigan's Upper Peninsula should receive careful planning and controls to prevent unrestricted development which could adversely affect or destroy existing intrinsic values. Alignment of any future lakeshore highways should be carefully planned so as not to restrict ultimate development of existing and proposed park areas.

12. Pollution of water is a major problem in the fresh water of the Great Lakes—not only from a consumption basis but in relation to recreation and biotic values. Adequate legislation and strict enforcement are needed to control sewage and industrial waste disposal.

13. In view of their possible national significance, further study should be given to Pigeon Point, the Huron Mountains, the Pictured Rocks, Sleeping Bear and Indiana Dunes to determine the best plan for preservation.

BACK COVER: Chapel Rock in the Pictured Rocks area of Michigan's Upper Peninsula. This is one of five areas singled out by the National Park Service as being of national significance. (See *Our Fourth Shore* on page 2 and National Park Service recommendations above.)



Chapel Rock in the Pictured Rocks region, Michigan

National Park Service