

unes. Their smoothsided ridges, rounded mounds, scoured bowls and rumpled expanses conjure images of *Lawrence of*

Arabia, camels and Bedouins in billowing garb. These restless landscapes capture the imagination and speak to our inner child. There is something magical about the changing canvases and the plants and animals that inhabit them.

Dune fields can be found along the Eastern and Western seaboards, along the Great Lakes or in isolated inland islands, where the conditions of wind, sand and erosion converge just right. Depending on mineralogy, dunes can appear buff, tan, black, coral pink or blinding white. Discovery can be riproaring, aboard an all-terrain vehicle or a plastic sled, or contemplative, gazing over the natural expanse.

The shifting sands can trap fresh water in ponds or shape estuarine marshes ideal for birding and fishing. Hiking, stargazing and photography pair well with dune exploration. Many dunes sit near campgrounds or rental services for dune conveyance, whether four-wheeled or four-legged.

Piping and snowy plovers, least terns and terrapins seek out the seaward edge of dunes for nesting. At California's Año Nuevo State Reserve, elephant seals lumber up the low seaward dunes for rituals of mating and pupping. Coyote, deer and bobcat can take shelter in vegetated dunes. Critters of the night leave a legacy of tracks. And always, the sand art mesmerizes with ripples, dimples and whip patterns.

The following seven sites highlight some not-to-be-missed dune fields and will carry you across the nation.

PARKER RIVER NATIONAL WILDLIFE REFUGE, MASSACHUSETTS

Parker River National Wildlife Refuge, which claims much of Plum Island, is a prime example of a barrier island dune-beach habitat on the Eastern Seaboard. Here, the dunes are a first line of defense against an advancing sea and are highly guarded from trampling feet. Boardwalks provide access for dune exploration and crossovers to the ocean beach. Else-

where, nature trails probe related sand habitats. In upland areas, pitch pine, beach grasses, wild rose, coastal shrub, bayberry and beach plum stabilize the shifting sands.

The refuge balances the needs of nature with human needs, providing summertime closures for nesting piping plovers, while opening the beach to recreation as the nesting season allows. Scopes and binoculars are uniform gear, especially in winter, when snowy owls are an enticement to venture forth in the cold. Snowy egrets arrive in the spring. Camping is available just north of the refuge in Salisbury.

CUMBERLAND ISLAND NATIONAL SEASHORE, GEORGIA

Another barrier island dune-beach habitat, Cumberland Island requires a passenger-only ferry trip to see it, unless you prefer paddling a kayak or have a private vessel. To spend the night on the island, visitors can either reserve in advance a permit for the designated primitive camps or a room at private Greyfield Inn. Warm, moist days can bring out the insects, but the pristine beaches and white sand dunes enchant, as do the reclaimed dune woodlands, thriving marshes and rich island history.

Visits begin with a ranger greeting. The small visitor center invites with porch rockers, and anglers drop lines off the dock. Island travel is by foot, but registered guests at the inn have access to a pool of bicycles. Armadillo, deer, raccoon, butterflies, acrobatic squirrels and wild turkey dwell on the island, and wild horses roam parts of the island near Dungeness Ruins.

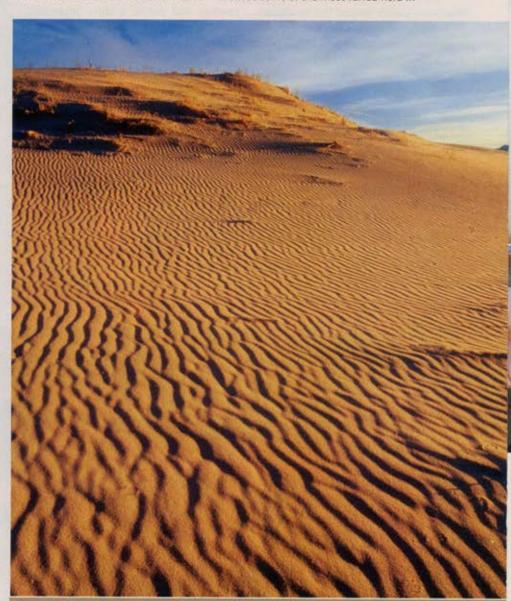
Black-and-white-striped barber poles guide beach hikers to boardwalk crossings that protect the dunes from random foot traffic, but designated trails afford acquaintance. The clean white dunes captivate with heights of up to 40 feet, ripples and buried trees. Wild turkeys appearing on a distant dune crest can elicit double takes and belly laughs as they race over the sand. When the sun burns too hot, the shade canopy of the reclaimed dunes invites with texture — moss-festooned oaks, scattered pines, saw palmettos and resurrection ferns.

Back on the mainland, motorhome camping is available seven miles north of the Cumberland Island Visitor Center at Crooked River State Park.

INDIANA DUNES NATIONAL LAKESHORE, INDIANA

At the southern extent of Lake Michi-

gan, this 15,000-acre national park unites the sweeping and steep dunes with a wave-lapped 15-mile lakeshore, oak savannahs, prairies, forests, swamps and marshes. It also encompasses the Chellberg Farm, a traditional 1900s farm. The park's rich mosaic houses some of the most varied flora in



Above: Patterns in the sand fascinate at California's Kelso Dunes, Mojave National Preserve. Bottom, right: Umpqua Dunes in Oregon Dunes National Recreation Area provides opportunities for hikers to experience the dunes firsthand. Bottom left: Jessie M. Honeyman Memorial State Park, also part of the Oregon Dunes NRA, serves as a convenient home base for RVing sand dune explorers.





the National Park System, shaping a vital wildlife area for 350 bird species, including blue herons and bank swallows that nest in the sides of dunes. Blue butterflies (Karner blues), nurtured on the leaves of blue lupine, flit between wildflowers.

The slow, herky-jerky retreat of the Wisconsin glacier shaped this landscape. Four distinct-age dunes can be witnessed here, with the oldest dunes farthest inland. These Great Lake dunes reach heights of 200 feet and roll out a rumpled terrain of ridges, blowouts and depression-cupped wetlands. Climax forests stabilize the older dunes. Discovery is via marked foot trails through dunes and dune-related habitats; binoculars enhance travel. A paved trail follows and salutes Calumet Dune Ridge.

The park features a designated horse trail and its own campground, open April through October. Dunewood Campground is first come, first served and can accommodate motorhomes of any length.

NEBRASKA'S SANDHILLS

Perhaps not the first area to come to mind

when you think of sand dunes, Nebraska's Sandhills represent the nation's largest dune formation, covering a whopping 19,600 square miles, much of it clad in native grassland. The dunes can top 300 feet in height. This is a land of bison, prairie dogs and sandhill cranes, private ranches and public wildlife lands and parks. To appreciate this expanse, you need to drive Nebraska's highways and byways. The state's Sandhills Journey Scenic Byway traces 272 miles along State Highway 2 from Grand Island west to Alliance, which covers bumpy prairies, planted woods, marshes, ponds and flowing waters. Public hiking trails and observation sites provide more intimate looks.

The Sandhills history traces back to prehistoric glacial deposits, followed by eras of blowing sand. Then came the emergence of native grasslands, swollen bison herds, homestead acts and present-day ranching. A significant stopover site along the Central Flyway, the Sandhills support more than 700 types of flora and 300 species of wildlife.



Arthur Bowring Sandhills Ranch State Historic Park in Nebraska is a living-history museum.

WHITE SANDS NATIONAL MONUMENT, NEW MEXICO

Rising from the northern Chihuahuan Desert in south-central New Mexico, the white gypsum dunes of this monument shape an inspirational, otherworldly landscape with the purple San Andres Mountains to the west and the Sacramento Mountains to the east. The monument enfolds 40 percent of the world's largest — 275 square miles — pure gypsum dune field (the rest sits on U.S. military land). Dunes here lift up to 60 feet skyward, and the most active dunes can migrate up to 30 feet a year.

The eight-mile Dunes Drive carries motorhomers into the heart of the dune field, passing mounds of changing character. The Nature Center at road's end explains the environment. Vegetation is thickest near the visitor center, thinning as you progress west and vanishing altogether by the time the drive ends.

Designated nature trails offer intriguing routes into the dunes. Animal tracks, wind patterns, drifts, slips and the glorious, blinding ultrawhite expanse urge you onward. Because shifting sand can dislodge guide posts, pay attention to surroundings, and if you cannot locate the trail, retrace your steps.

Backcountry camping for backpackers (the only overnight use available inside the park) treats overnighters to a stunning star show, trading glistening sand for glistening stars. Five full-service RV parks are located 15 miles northeast of the mounument in Alamogordo.

KELSO DUNES, CALIFORNIA

In Mojave National Preserve, these golden sand pyramids, 600 feet tall, are the third tallest dunes in North America. Trapped by the Providence and Granite mountains, blowing sands from dry lakebeds settled here, covering 45 square miles. These are stacked dunes, built up in five cycles over the last 25,000 years, when droughts created loose sands that the winds took walking.

The massive dune field, 43 miles south of Baker, has few amenities. The final distance is on a gravel road suitable for conventional vehicles, but take a dinghy vehicle if you have the option. At the gravel parking area, you'll find interpretive signs and vault toilets.

An impressive sight, Kelso Dunes also speak. While exploring the dunes on foot (no motorized vehicles allowed here), you may hear singing or booming. When wind-loosened sands sheet down the steep dune faces, the sliding motion over stationary sand produces rumbling, a sound phenomenon heard at only 30 dunes in the world.

The Preserve's Hole-in-the-Wall Campground has 35 dry-camping sites and boondocking is allowed at certain designated Roadside Camping Areas.

OREGON DUNES NATIONAL RECREATION AREA, OREGON

Within Siuslaw National Forest, the area's

hilly sands and ocean shore stretch more than 40 miles along the central Oregon coast between Florence and Coos Bay. Whether one's excitement comes from shooting over the dunes on an all-terrain vehicle (ATV), riding horseback in the surf, hiking to the top of a wilderness-like dune or jumping aboard a cardboard sled, the dunes answer the call.

The dunes can reach heights of 400 feet. Separate beach and dune areas serve hikers and ATV riders, allowing each to revel in their own way. Freshwater lakes and rolling surf call to anglers. With dune, coastal forest, lake and ocean habitats, wildlife sightings vary, and may include tree frog, hummingbird, beaver, deer and sea lion.

Coastal communities along U.S. Highway 101 offer services, including dune vehicle and horse rentals. U.S. Forest Service campgrounds and private RV parks dot the corridor, and maps and recreation ideas are offered at the Reedsport visitors center.

FOR MORE INFORMATION

CUMBERLAND ISLAND

NATIONAL SEASHORE

(912) 882-4336, extension 254, www.nps.gov/cuis.
CUMBERLAND QUEEN (FERRY) (877) 860-6787.
INDIANA DUNES NATIONAL LAKESHORE (219) 926-7561, extension 3, www.nps.gov/indu, MOJAVE NATIONAL PRESERVE (760) 252-6100, www.nps.gov/moja.
NEBRASKA SANDHILLS JOURNEY SCENIC BYWAY www.sandhillsjourney.com.
OREGON DUNES NATIONAL RECREATION AREA (541) 271-6000,

PARKER RIVER
NATIONAL WILDLIFE REFUGE
(978) 465-5753,
www.fws.gov/northeast/parkerriver.
WHITE SANDS
NATIONAL MONUMENT
(575) 679-2599,

www.fs.fed.us/r6/siuslaw/recreation/

tripplanning/oregondunes.

www.nps.gov/whsa.

(FSD). According to Koni, the internal FSD system allows the shock to remain firm on smooth (low frequency) bumps, but when the coach is subjected to rough (high frequency) bumps an internal valve is employed to help reduce the typical harshness that would result if the shock used single-stage valving. Koni offers a lifetime shock warranty for the original owner.

The Bilstein Comfitrac gas-charged shock has a special 1.81-inch diameter piston that allows the shock to react normally over smooth roads, but when the road gets rough the shock uses a bypass valve to divert the flow of shock oil, and the result was noticeable as shown by our ratings. Bilstein backs its product with a lifetime aftermarket warranty.

RoadKing modifies the gas pressurized system by greatly increasing the size of the internal piston. This shock uses a 2%-inch piston bore, which results in a large increase in total piston area inside the shock. This greater diameter allows the shock to spread out the damping load over a greater area and reduce the overall harshness over rough roads while still maintaining control on smooth roads and corners according to RoadKing.

As you can see in our ratings, each shock has its strengths and weaknesses. Because we are not suspension engineers, we can only comment on the results obtained in our tests as opposed to deciding a winner based on engineering or design. Now that you are armed with more information, hopefully you will be able to select the shock that most suits your needs. •

FOR MORE INFORMATION

(858) 386-5900,

www.bilstein.com.

Circle 226 on Reader Service Card.

(866) 566-4175,

www.konirv.com.

Circle 227 on Reader Service Card.

(619) 766-9207,

www.roadkingshocks.com.

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