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# THE WORLD OF THE JOSHUA TREE

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## What Is A Joshua Tree ? ? ?

Joshua trees along with giant Saguaro Cactus are symbols of the unique deserts of the Southwest. These "tree yuccas" are found only in North America in the states of California, Arizona, Utah and Nevada, confined mostly to the Mojave Desert (elev. 2,000-6,000 ft). They thrive in the open grasslands of the Mojave Desert as characterized by the Queen Valley and Lost Horse Valley of Joshua Tree National Monument.

Joshua trees (*Yucca brevifolia*) belong to the Agave Family. They acquired their peculiar name from Mormon pioneers moving to California. When the Mormons were making their journey through Nevada they encountered this giant tree yucca. The branches resembled the arms of Joshua beckoning them farther west.

Many members of the desert wildlife community depend on the Joshua tree for food and shelter. But not only wildlife benefits from this plant. In the past Indians ate the flowers and collected the nutritious seed for food.

The life cycle of the Joshua tree is complex. It can grow from seed or from an underground rhizome of another Joshua tree. It is difficult to determine the age of a Joshua tree because it lacks annual growth rings as would be found in a pine tree or maple. The trunk of the Joshua is made of thousands of small fibers. This tree is not very sturdy because of its shallow root area and top-heavy branch system. But if it survives the rigors of the desert it can live several hundred years.

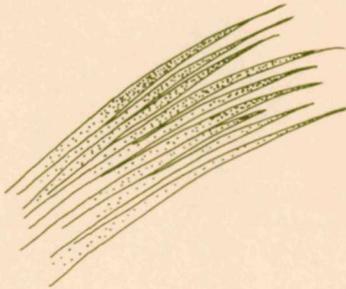
One of the most beautiful spectacles in the springtime is the creamy white blossom of the Joshua tree. These white candles can be seen from February to late April. The Joshua tree does not bloom every year due to the environmental factors of fluctuating precipitation and temperature. When a Joshua tree blossoms, the old stalk remains at the tip of the branch for 2-3 years. During this time branching occurs on either side of the stalk. This tree is a slow grower exhibiting a growthrate of one third to one half of an inch a year.

In Joshua Tree National Monument, the Joshua trees were used widely by early settlers for firewood and fences. This led to the disappearance of the larger trees (some were reported to be 30-60 ft. tall). Today the Joshua tree "woodland" is beginning to take shape again. As the "woodland" recovers so does the wildlife dependent on the tree. Turn to the inside page for a more in depth view of the Joshua tree world.

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## What Is The Difference Between These Three Common Desert Plants?



**PARRY NOLINA**— grows at 4,000 ft. and above in the rocks and canyons. The foliage is much more supple than the following two plants. There are no fibers on the blade edges.

**MOHAVE YUCCA** — grows throughout the Colorado and Mohave Deserts. The blades are rigid with numerous fibers curling along the edges.



**JOSHUA TREE** — grows naturally at 3,000 ft. and above. The blades are much shorter than either of the above plants, and they are rigid but have no fibers. In its maturity it becomes an actual tree, whereas the Nolina and the Yucca never attain such size.

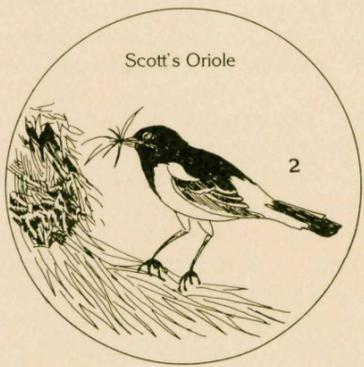


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## Wildlife Of The Joshua Tree World

- 1 — The Cactus Wren, one of the largest wrens is often seen hopping around the Joshua Tree, chattering loudly while feeding on the numerous insects.
  - 2 — In the springtime, a closer look at a Joshua Tree might reveal the hanging nest of the yellow and black Scott's Oriole.
  - 3 — Look to the top of a Joshua tree — many times the Red-Tailed Hawk is perched on top watching for his next meal.
  - 4 — The Desert Woodrat awaits the evening inside his "castle", the Joshua tree. An easy way to detect the presence of this fellow is to look for gnawed branches.
  - 5 — The dead debris of the Joshua Tree becomes a home for the Yucca Night Lizard. This lizard is only seen at night scurrying around and under the dead vegetation.
  - 6 — It would take a long time to recycle dead vegetation back into the desert ecosystem if it were not for the activity of the termite. This small insect is continuously helping to break down vegetation by its constant chewing.
  - 7 — This small moth accomplishes the task of pollinating the Joshua tree flower. She collects the pollen in a ball and forces it down into the flower to fertilize the seeds. Why? — so that there is a sure source of food for her young when they hatch from the eggs that she has laid.
  - 8 — A small animal called the Antelope Ground Squirrel can be seen scurrying all over the Joshua Tree in its search for food. In the spring piles of the Joshua's flower can be found under the tree. These flower-piles are evidence that the little ground squirrel has been on his rounds.
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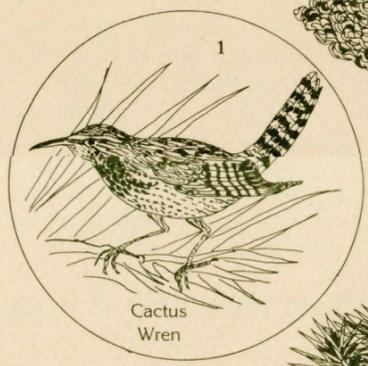
Scott's Oriole

2



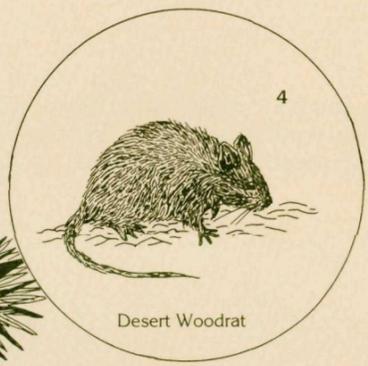
Red Tailed Hawk

3



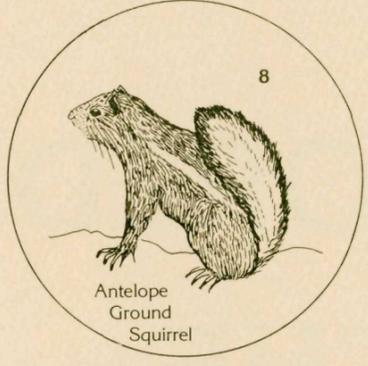
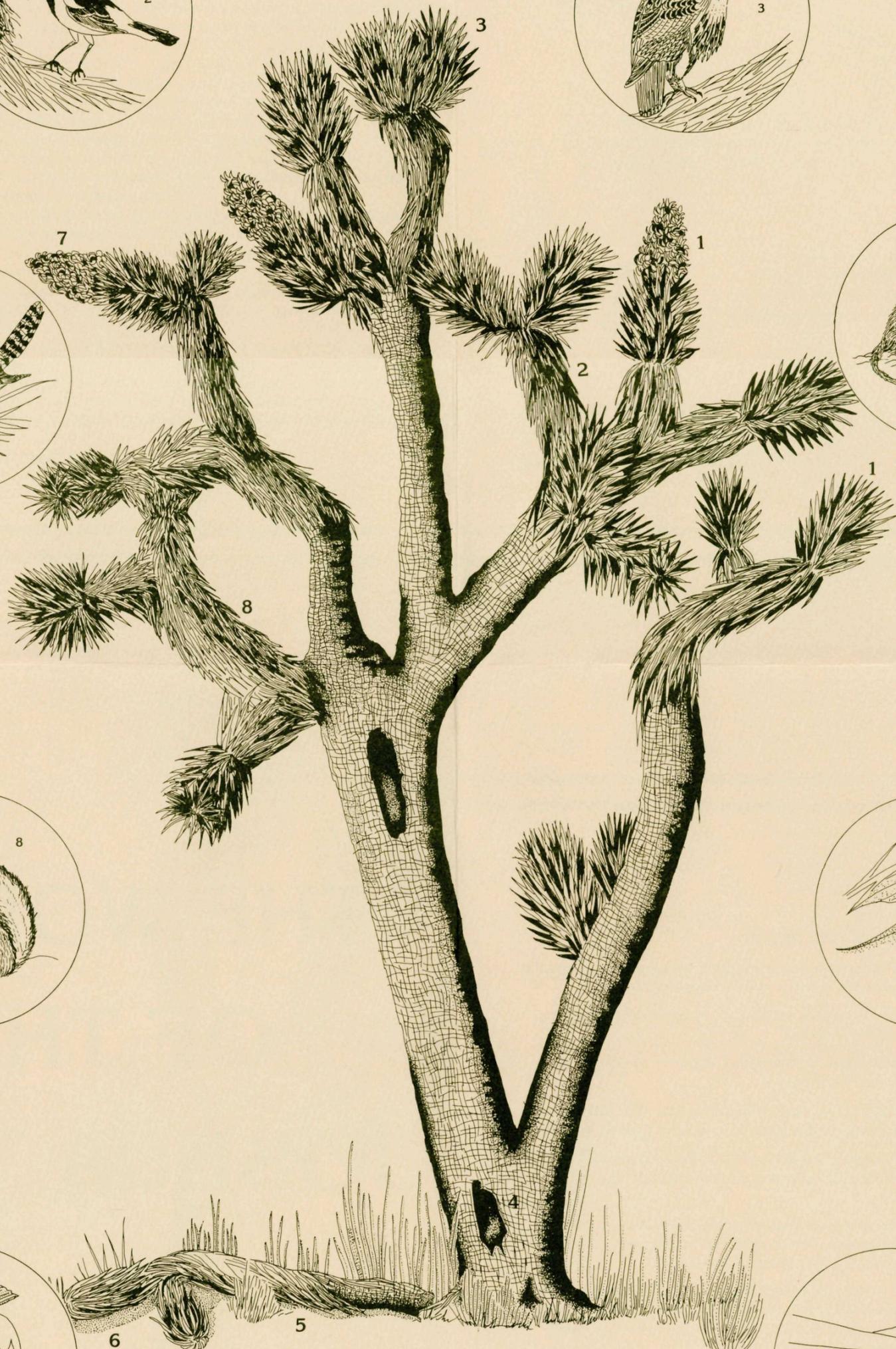
Cactus Wren

1



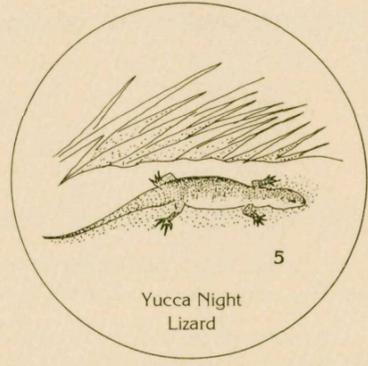
Desert Woodrat

4



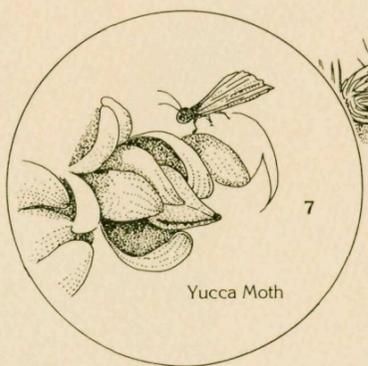
Antelope Ground Squirrel

8



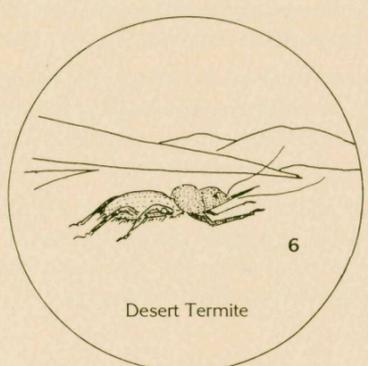
Yucca Night Lizard

5



Yucca Moth

7



Desert Termite

6