PELICANS IN
SAG HARBOR?

Evolutionary Stasis

When the editors of the *Sag Harbor Express* heard reports of pelican sightings on the Jersey Shore, they suspected we might soon see the big birds bobbing on Sag Harbor Cove. After all, giant blue herons and snowy egrets already are poking in our waters. It had the makings of an important story and, eager to learn more, the editors dispatched me to the West Coast of Florida where pelicans regularly congregate. A little research at Mote Marine Museum on Longboat Key revealed that pelicans have been around since the Miocene period, six million years ago. Mother Nature, the Great Evolutionist, had to be in a whimsical mood when she designed pelicans. They don't look like any other bird. A knobby, hairless head, a long bill with a throat pouch attached to the lower mandible, a pose on the water or sitting on a piling like an old man trying to grab a nap, a fat body that looks impossible to get airborne.

When you see pelicans floating in the water, or more rarely waddling on the beach on short, stubby

legs, you'd never believe they can fly, and fly well, but they do, and they seem to enjoy it, with their big beaks thrust forward as if cutting the air. They cruise along, skimming the water, their wing tips sometimes flicking the surface, creating "ground effect," or in this case "water effect," thus saving energy. Hunting alone or with a wing man, like fighter pilots, you see a pair of the big birds suddenly rise twenty or thirty feet into the air, then both plunge beak first into the water to stun and catch a small fish. Unless there's a big school of small fish, it's hard to believe that the wing man spies and traps another fish at the same moment as the leader. It's more likely that the companion pelican emulates the leader's dive to show that he's a good buddy. Before hitting the water, the pelicans twist left in order to protect their trachea and esophagus. The big bird doesn't always need to dive to catch fish. It might also paddle along in the shallows and simply dip its long beak into the water for a finny tidbit.

Pelicans appear to be dignified and intelligent. They are generally silent unless a predator nears a nest and they snap their bills to create a loud popping sound. Brown pelicans are the smallest of the species, yet they

weigh up to ten pounds, heavy for a bird. They look like they weigh much more and it's only because air pockets in their bones and under their skin keeps them light, enabling them to float high, like a styrofoam cup, and cushion the impact when they dive into the water. Their broad wings might span seven feet, tip to tip, perfect for soaring and gliding. The large throat pouch, called a gular pouch, is the pelican's most distinguishing feature. When the pelican captures a fish, it takes in as much as two gallons of water, then stretches its beak high and shakes out the water before swallowing the fish.

Pelicans are related to ibises, gannets and boobies. Surprising for such a large, web-footed bird, brown pelicans nest in trees, no doubt picking out strong branches. The Cornell Lab of Ornithology, an excellent source for all things birdlife, says that pelicans incubate their eggs by standing on them with their big webbed feet. They inhabit all continents except, showing good common sense, polar regions. Alas, pelicans live only 15 to 20 years. Year ago they were devastated by DDT, almost to the point of extinction, especially when their favorite food,

anchovies, carried the pesticide. But they've recovered since and now their major threats are abandoned fishing line and hooks which get stuck in the pouch, and of course oil spills.

In ancient Egypt, pelicans were associated with death and drawings of the bird were scratched onto the walls of tombs. On the other hand, since the pelican is rumored to wound itself and leak blood to feed its young, Catholics once revered the bird as a symbol of Christ's sacrifice. The State of Louisiana has declared the pelican its official bird, though fishermen probably voted against it.

Getting back to evolution, a French researcher Antoine Louchardt, writing in the *Journal of Ornithology*, reported on a skeleton find that seems to indicate pelicans have not changed much in 30-million years. He refers to it as "evolutionary stasis," meaning if the design works, why change it. If the kids are listening, you might teach them this familiar pelican doggerel, which I duly recited to the *Express* editors:

A wonderful bird is the Pelican,
His beak can hold more than his belly can.
He can hold in his beak

Enough food for a week!

But I'll be darned if I know how the hellican.

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