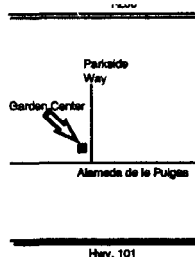


## This Month's Program

Julie Thayer of the Point Reyes Bird Observatory will present a program on the **Breeding Birds of Año Nuevo Island**, concentrating on the Rhinoceros Auklets, and featuring Western Gulls, Pelagic and Brandt's Cormorants, Pigeon Guillemots and Black Oystercatchers.

We are also trying to make arrangements to have her show some of her videotapes, including one on this last summer's Masked Booby.



## Help Wanted!

Here are a few of the many opportunities for helping Sequoia Audubon in our continuing mission on behalf of birds and bird-related habitat in San Mateo County.

**EDUCATION COMMITTEE:** Teaching our children to understand and appreciate nature is one of the most important efforts we can make. Our Education Committee coordinates the San Mateo County sign-ups for Audubon Adventures, and committee members also make occasional special presentations in classrooms and represent Sequoia Audubon at local bird-related fairs and conventions. No special prior experience is necessary, but teachers and parents are particularly needed.

**CONSERVATION COMMITTEE:** One of the other pillars of Sequoia Audubon is our strong and active Conservation Committee. Due to a series of committee member departures from our area, the committee is desperately in need of additional members. I urge all members with a particular interest in conservation to call me to learn more about our efforts to revitalize this important committee.

—Francis Toldi

## From the President

Francis Toldi

### Sequoia Audubon - Looking Back, Looking Forward

Our eagle-eyed editor discovered that we are coming up on a major anniversary at Sequoia Audubon. Our current *Needles* is numbered volume 49, meaning next year will be fifty. Sequoia Audubon itself may already be a bit beyond fifty years old, although documents from the earliest days are hard to find. Over the next few issues I will be digging up and excerpting materials from Sequoia's past.

Sequoia has a rich history. Reading through the old materials makes me appreciate the many people — unknown to most of us now — who put in years of time and money to keep this organization alive and active. Some of the old materials are quite poignant, giving a glimpse into the people and battles of days gone by.

From the minutes of the March 2, 1961 Board Meeting: "From National Audubon's Conservation Guide, Miss Breckenridge read progress reports concerning legislation on the proposed Point Reyes National Seashore and the Wilderness Bill." Houses on Bair Island would be an abomination, but can you imagine beach front condos at outer Point Reyes? Or how about a golf course on outer Tomales Point?

From the *Sequoia Bulletin* (predecessor to the *Needles*), Volume 12, #6, May-June 1959, list of upcoming field trips; "May 16 - Searsville Lake. Meet at Searsville Lake Park at the gate at 9:00 a.m. There will be a charge of 25 cents per person for admission to the park."

In a future issue we will discuss our plans to properly celebrate our achievement with this organization. In the meanwhile, here is a question: who is the longest-standing Sequoia Audubon member? Please let us know if you have been a member for a long time, and we'll give you proper credit in these pages (if you want it!). I am also interested in any stories about "the old days," so I urge you to call or write with any recollections.

Looking back also makes me look forward. I have written about our urgent need (*see opposite column*) for the continuing involvement of our membership. We are currently passing through a critical stage in our on-going development. The only way we can continue for another five years — let alone 50 years — is if interested members step forward and become involved. There are many ways to become active, some requiring only a minimal investment of time.

So thanks again to all who worked so hard on behalf of Sequoia Audubon Society. Help us keep this wonderful group alive and healthy in years to come!

*The mission of Sequoia Audubon Society is to participate actively in environmental education, and conservation and in the restoration, preservation, protection and enjoyment of our native natural resources with emphasis on birds and their habitats.*



## The S A S Calendar

### THURSDAY, NOVEMBER 5 — BOARD OF DIRECTORS MEETING at the

Audubon Office at 7:30 PM. All members are welcome to attend.

### THURSDAY, NOVEMBER 12, GENERAL MEETING —

Julie Thayer of the Point Reyes Bird Observatory will present a program on the **Breeding Birds of Año Nuevo Island**, and perhaps include some footage on this summer's Masked Booby, at the San Mateo Garden Center on the Alameda at Parkside. Get together at 7:30 PM with the meeting starting at 8:00.

### SATURDAY AND SUNDAY, NOVEMBER 7-8 — THE SACRAMENTO WILDLIFE REFUGES, GRAY LODGE AND THE BUTTES —

The USF&WS estimates that duck and goose numbers will be down by 8% this year. Nevertheless, this is one of our most visual field trips and there are real opportunities to see "clouds" of ducks and geese filling the air. This is a car-caravan tour since walkers tend to disturb the wildlife. We will meet at 7:00 AM in the parking lot of the Blue Gum Motel on Saturday morning and again at 9:00 AM on the parking lot of the Sacramento Wildlife Refuge. The motel is just off I-5, 3 miles beyond Willows. Take the next off-ramp after the motel's sign and turn right onto Blue Gum Road. At the end of the road turn left. The motel is approximately 1/4 mile on the left. There are other motels in Willows and along I-5 and camping at the state park in Colusa. Motel reservations are advised. Trip reservations are required so that we may know how many to expect at each rendezvous point. Call the leader for more information and for your trip reservation,



**LEADER CLIFF RICHER 873-1754**

### SUNDAY, NOVEMBER 22 — PRINCETON HARBOR —

The only sheltered harbor between Santa Cruz and San Francisco, Princeton Harbor is winter home to a good variety of bay ducks, loons, cormorants and other divers as well as gulls and shorebirds. To get there take Hwy 92 to Hwy 1 and follow Hwy 1 north to Capistrano Rd. and turn left at the lights. Take your first left and proceed straight ahead to the upper parking lot where we will meet at 9:00 AM. This will be a walking trip along the beach and rocks with some areas of broken footing, so boots or sturdy shoes are recommended. The trip should break up at noon.

**LEADER CAROL MILLER 726-2605**

**THURSDAY, NOVEMBER 27 - COYOTE POINT —** A special week-day field trip to explore the birds and environmental assets of this very special area. The trip will begin at 9:00 AM. We will meet at the lower end of the museum parking lot near the picnic benches. Moderate walking makes this a good trip for the whole family. **RAIN CANCELS THE TRIP.**

**LEADER SUE COSSINS 347-9358**

November, 1998

## Field Trip Report

### Princeton Harbor - Sept. 20

Al Jaramillo

We had a big group of more than 20 participants and saw 64 species, including some interesting birds. The highlight was a Hammond's Flycatcher at the Princeton Willows. It showed a nice entirely black bill, gray head contrasting with a greener back, a bold eye ring, grayish throat, yellowish underparts and long primary extension. It was in fresh plumage as all age groups of southbound Hammond's Flycatchers are supposed to be. This is the first one of these I have seen in the county.

Al Eisner showed up seconds after the flycatcher had gone and, while trying to re-find the bird, we saw a juvenile Willow Flycatcher (only my second in the county!) which Al had seen earlier.

There were lots of Yellow Warblers around, as well as a good number of Townsend's Warblers, smaller numbers of Wilson's Warblers and one Orange-crowned Warbler and some "heard only" Common Yellowthroats. Our quest to find some eastern vagrant warblers was unsuccessful, but the flycatchers were great consolation prizes. We ended the day at the mouth of Pilarcitos Creek with three juvenile Pectoral Sandpipers and, thanks to Merry Haveman, some distant Snowy Plovers and four White-winged Scoters just offshore.

It was a nice half day of birding which allowed me to introduce several people to some of the coastal birding sites.

## Tick Bites

By November, the tick season is usually over but in this El Niño year when ticks have been thriving there are some likely to be hanging on. So, when hiking, stay on trails. Avoid brushing against shrubbery or walking through tall grass. A long-sleeved shirt, a hat, and pants tucked into socks are recommended.

Some insect repellents are said to be good against ticks. Deep Woods Off or any other repellent containing a high percentage of DEET is good but since some people are sensitive to DEET, use it according to label instructions. It's powerful stuff and will melt most plastics. Keep it away from your binoculars and scopes. The really heavy repellent is Permethrin, which is sprayed on outer clothing and lasts 2-3 weeks per application. Spray down all outer clothing, especially hat, collar, waist, and ankle areas. DEET products may be used the same way but need to be renewed every time out. Even when you use a repellent, check your body carefully when you return from the field.

To remove a tick, use tweezers to pull the it straight out. Clean the bite with soap and water and use an antiseptic.

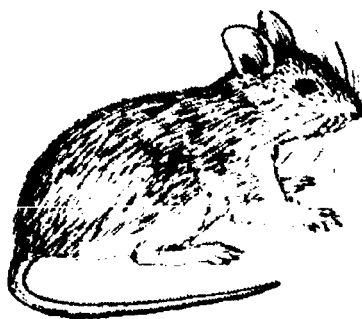
Some ticks carry Lyme disease, and this illness is more common than most realize. California has hundreds, if not thousands, of Lyme cases each year. The final outcome of this disease is vascular dementia. Lyme disease is easily cured soon after a bite, but very difficult to get rid of after a few months.

If you have been bitten by a tick, your doctor may recommend a blood analysis at a cost of about \$100 and a wait of several weeks for the results. More practically, you can start treatment right away with 21 days of an antibiotic like doxycycline at a cost of about \$40. A vaccine against the disease is rumored to be close to being available.

Sequoia Audubon Society

# Hantavirus Found on San Bruno Mountain

Hantavirus, the mysterious respiratory disease that caused so many deaths in the Southwestern Native American reservations and pueblos a few years ago, has been found in the deer mice of San Bruno Mountain State and County Park. We can assume that it can be found anywhere in California.



The virus is carried by other rodents as well and they do not appear to be affected by the illness. Therefore, all rodents should be treated as infectious and handled with proper precautions.

Fortunately, pets, such as dogs, cats, hamsters, and birds, are not known to transmit hantavirus to people.

Hantavirus is still a rare illness so there should be no cause for panic but you should try to avoid rodents and their excretions. Take normal measures to avoid rodent infestation, but do not use live traps. Handling live rodents can expose you more heavily to the disease.

If you're going to use a "primitive" cabin or camp outdoors, make sure the cabin is well ventilated and aired-out before being occupied. Inspect for rodents and do not use it if you find signs of rodent infestation.

If you're camping, check the area for rodent droppings and burrows. If you find any do not disturb them, just find another camping area. Avoid sleeping near woodpiles or garbage areas that may be frequented by rodents. Avoid sleeping on bare ground; use elevated cots or mats if available. Store your food in rodent-proof containers and promptly discard all garbage.

When you have to clean up a rodent's nest or an area where there are rodent droppings, remember that hantavirus is transmitted by inhaling aerosols contaminated with virus from rodent secretions. Therefore, try to avoid creating dust while cleaning. It is a good idea to ventilate the affected area the night before by opening doors and windows. Clean the affected area with paper towels or a wet mop. **DO NOT SWEEP OR VACUUM.** Use rubber gloves and apply household disinfectants at the maximum concentration, allowing at least 30 minutes contact time before removal. Double bag the clean-up material and debris securely in plastic bags and seal them. Wash your hands in disinfectant followed by soap and water *before removing* your gloves, dispose of the gloves, and then disinfect and wash your hands again. Double-bagged clean-up materials and gloves can be disposed of outside with other household waste.

The symptoms of hantavirus pulmonary syndrome include fever, headache, shortness of breath, severe muscle aches, coughing, vomiting and abdominal pain. These symptoms may last a few hours to several days. As the illness progresses, the

lungs fill with fluid, making breathing difficult. Respiratory failure can follow rapidly. Approximately 50% of hantavirus patients have died, but most of these occurred before the disease was well known.

There is no cure or specific treatment for hantavirus infection, but early diagnosis and good medical care will allow your body to fight off the illness. **Prompt detection is important.** Contact your doctor immediately if you become ill with flu-like symptoms 1 to 6 weeks after exposure to rodents, their nests or their excretions.

*(Adapted from handouts by the Center for Disease Control and Prevention.)*



## NAS VP Gets Medal and Elected President of AOU

Frank Gill, National Audubon Society Senior Vice-president for Science, was awarded the William Brewster Medal from the American Ornithologists' Union at their recent meeting in St. Louis. This is the most coveted award in American ornithology. At the same meeting, Frank was elected president of the American Ornithologists' Union, and John Fitzpatrick, NAS board member and executive director of the Cornell Laboratory of Ornithology, was named President-elect.

## Future Programs

The following is a tentative list of this year's scheduled programs for the general meetings. Because the unexpected is inevitable, this schedule may be subject to change and you should refer to your most current *Needles* for actual changes.

- January 14, 1999: Jennifer Boyce, US Fish And Wildlife Service Wildlife Biologist, will describe the "Common Murre Breeding Colony Restoration Project on Devil's Slide Rock in Pacifica."
- February 11, 1999: SAS's own Leslie Flint will describe her "Alaska and Pribilof Island Trip".
- March 11, 1999: Biologist Ray Peterson of Audubon Canyon Ranch: "An Audubon Canyon Ranch Update — Raven Predation"
- April 8, 1999: Coyote Creek Ornithologist Al Jaramillo, on "Bird Banding and Migrants at Coyote Creek"
- May 13, 1999: Rich Kuehn and Dean Schuler of Wind and Sea Productions will preview their latest video effort, "Birds, Castles and Cathedrals of Britain"
- June 10, 1999: "Trinidad Birding" — SAS's Francis Toldi will reprise his Caribbean trip at the June potluck.

## County Butterfly Endangered

John Steiner

The calliope silverspot has been listed as endangered under the United States Endangered Species Act. Imperiled because of loss of habitat, the calliope silverspot, once common in numerous localities around the Bay Area, is now found in only one place in San Mateo County (*Milagra Ridge?*) and one place in Solano County. Both remaining populations are themselves vulnerable.

The butterfly depends upon native violets which grow in grasslands. Female calliope silverspot butterflies lay their eggs on or near the violets, and the caterpillars, which hatch in a week, stay near the plants. They become dormant, passing through the summer and winter before waking up and the following spring. The caterpillars grow rapidly, shed their skins five times, eat only the foliage of the grassland violets and then enter a two week pupal stage, during which they reorganize their bodies and develop wings, finally emerging as adult butterflies.

The adults live for only a week or so, and must find mates and lay eggs on violets before they die. The eggs hatch, the caterpillars become dormant, and the life cycle resumes.

A species in danger is a sign of trouble for the rest of its ecosystem. Since the butterfly is utterly dependent upon healthy populations of violets, and since violets are grassland wild flowers, the butterflies serve as extremely useful indicators of healthy grassland ecosystems. The decline of the butterflies signals trouble for California grasslands, and for the other animals and plants that live in the grasslands. Protecting the butterflies' habitat, and keeping the insects from disappearing also protects other grassland species. In the long term, ecosystem management will help us get ahead of the rising tide of species needing individual attention.

*John Steiner is a Master of Science candidate who investigated the ecology of Bay Area hurteiflies. This piece is excerpted and adapted from th Spring, 1998 issue of Tidelines, the Newsletter of the SFB NWRR*

November, 1998

## Feeding Wild Animals

Killing With Kindness  
Cliff Richer

Although feeding wild birds has become generally accepted, the feeding of other wild creatures is almost universally deplored. There are good and plentiful reasons for this.

**Getting more than you bargained for:** Many a person who has fed cats, raccoons or opossums in his or her backyard has learned that they can end up with skunks, rats, even coyotes and, in one case that I know of, a very big, very aggressive wild pig with an imposing set of tusks. A few years ago, a few well-meaning ladies engaged in the feeding of deer at San Pedro Valley County Park. They persisted despite repeated warnings from the ranger staff. It took a face-to-face confrontation with a mountain lion — attracted by the many unwary deer — to dissuade them.

**Animals lose their fear of people:** I know of a number of people who have ended up with raccoons in their kitchens or living rooms, with disastrous results. Most bear "incidents" occur where black bears associate people with food not peril.

**They ain't all Bambi:** People tend to be scared of big fierce predators with sharp claws and big teeth. The fact is that more people are injured by coming too close to herbivores such as deer, elk, antelope and bison than are attacked by mountain lions, sharks, alligators and other "usual suspects".

**The vector factor:** Many wild animals carry diseases to which they are immune but which can be painful or injurious to you. Lyme disease, carried by deer ticks, is the current "favorite", but bubonic plague, valley fever and hantavirus can be carried by those cute little squirrels and mice and rabies by any mammal. By the way, two of those are

incurable and the fifth is invariably fatal, with a cure that is painful enough to make you consider the alternative.

**You can do more harm than help:** Animals that get hooked on human food can't always distinguish between food and packaging. Animals have died from ingesting paper and plastic that smelled fine but was completely indigestible.

**So here are the rules:** *Never feed wild animals no matter how friendly or cute they are.* This includes feral cats. My wife once got away with petting a bobcat kitten, but nearly lost an arm to blood

poisoning when a feral cat bit and scratched her the following week.

*Don't leave pet food or even their dishes outside.*

*Secure garbage cans and their lids*

*Pack camp food or picnic baskets away securely.*

*Never leave food or food packaging where wild animals can get to it.* These

last two rules can be a real challenge. Your typical Yogi Bear can identify coolers, hampers, bottles and other packages by sight or smell and can dissect a BMW faster than you can say "Ho-Ho-Ho".

*If you feed birds, keep the feeders clean and try to avoid feeding squirrels, raccoons and other wildlife.* If you have raccoons, the solution requires patience and persistence and if you have a squirrel problem, you may need to call your psychic hotline.



In Oklahoma a bill to eliminate the exception that allows the shooting of hawks and owls suspected of taking domestic birds and wildfowl failed when hunters who blame the raptors for declining game populations opposed it.

The bill would have brought state law into compliance with federal regulations.



## Crystal Springs Count

### Some Thoughts on the Past

Cliff Richer

The Crystal Springs Christmas Count marked the beginning of Sequoia Audubon. Jim Rigby organized the first count in 1948 and conducted it with the help of some San Mateo county members of Santa Clara Valley Audubon who founded Sequoia. When he moved out of the area in 1949 the count was abandoned by SCVAS and not revived until 1955 by SAS. The count is still run on the count circle established by Jim.

The first count produced only 112 species, but two of them have never been found again in the count circle. The Blue Goose (then a separate species) and the Rufous-crowned Sparrow are still the only Christmas Count records of these species. And it took 42 years to find another Rock Wren — in the same area as the original sighting!

The 1955 count was compiled by Oleta Dickenson and the 1956-1971 counts by B. Neil Dickenson. It was a team effort in each year with Neil doing the field work and Oleta doing the paper-work — and later taking charge of the count dinner as well. Neil was extremely conservative in his sighting reports. For example, in 1979 he wrote, "My biggest regret is that I didn't report the Yellow-billed Loon in 1971...Bob Bailey and I studied the bird in Upper Emerald Lake long enough with a 40 power spotting scope in excellent light." There never were any other sightings on the count.

The first counts failed to take full advantage of scoping from Pillar Point. Pelagic and off-shore species were rare until Barry Sauppe took over as compiler in 1974. From then on the numbers and varieties of seabirds steadily increased. For example, no Northern Fulmar was reported until 1976 but was reported every year thereafter except for 1986 (heavy off-shore winds) and 1987, when Barry had to cut his scope time.

The most famous duck — indeed the most famous bird — of the count history was 1981's Smew. This little merganser — apparently convinced it was a goldeneye — migrated south with Foster City's winter residents for two years, at-

tracting birders from all over the United States.

The development of Foster City caused the loss of some prime birding habitat but did create a reliable spot in which to find Barrow's Goldeneyes, Hooded Mergansers and concentrations of shorebirds. The first Barrow's Goldeneye was recorded in 1970, and has been found on every count since 1974.

Broad-wing hawks migrate through but rarely winter over. The sole Christmas Count record comes from a little league field near Marine World Parkway in 1982. Prairie Falcons are extremely rare along the coast at any time, as shown by only two records in 1980 and 1988.

The elusive Black Rail is probably extirpated from the count circle today, but even when it was common, it was only counted twice (1960 & 1972). The Clapper Rail, once found regularly, has been nearly extirpated by introduced predators.

One lost Sandhill Crane found its way onto the count in 1985. Pete and Donna Petersen were greeted with lifted eyebrows when they reported this bird — until another observer said, "Thank God, I thought I was hearing things!"

By 1965, Neil Dickinson was certain he could pick out wintering Semipalmated Sandpipers from the flocks of western peeps and semipalmateds appeared on five out of the next six counts. He promised to write a newsletter article describing his technique, but we are unable to locate a copy. The technique has apparently been lost and no other semipalmateds have been recorded outside of those years.

The Rock Sandpiper was first found on the Princeton jetty in 1969 but it wasn't until 1978 that it became a regular fixture. The bird finally succumbed to old age or the perils of nature and has not been seen since 1992.

Neil admitted to having trouble separating the two dowitchers so it wasn't until 1969 that both appeared on the count.

Wilson's Phalaropes were spotted on the 1963 and 1966 counts and Red-necked Phalaropes in '65, '66 and '68. Red Phalaropes had to wait for Barry Sauppe's off-shore scoping to make their

first appearance in '73 and have been seen every year since (as long as wind and weather have cooperated.)

Barry found the first Pomarine Jaeger in 1982 and every year thereafter except 1985. Two Parasitic Jaegers were seen in 1984 — their only appearance. Black-legged Kittiwakes have been seen irregularly since 1974 and one Sabine's Gull showed up in 1986.

Caspian Terns apparently wintered over regularly in the 50's and 60's and they were reported from nearly every count through 1972. Thereafter they made some isolated appearances.

## Everglades Update

In a departure from the usual, Lynn Ferrin, editor of the California State Automobile Association magazine, *VIA*, wrote "The Everglades are seriously endangered and may not survive. Too much water has been diverted to cities, suburbs, and megafarms, and what does arrive often comes in the wrong quantities at the wrong season, and dangerously polluted. The Everglades' population of nesting wading birds has declined by 93 percent. Usually, a national park's official brochure is full of admiring descriptions, beautiful photographs, and advice for the visitor. But the brochure for the Everglades is mostly devoted to the environmental crisis and proposed solutions, which are very, very expensive. Will we have the will and the resources to save it?"

In fact, both the State of Florida and the Congress of the United States have made this commitment to the fabled "river of grass". Lead agency to accomplish the rescue effort is the US Corps of Engineers.

Their first annual progress report is now due for presentation to the Florida State Legislature. Kimberly Jacobs, the CofE scientist responsible for its preparation, gave early indications to your editor that the report will show that the ground-work is firmly established for a full recovery.

*(Mrs. Jacobs is the youngest daughter of Cliff Richer, longtime SAS board member and editor of the Needles.)*

# The Ballad of the Masked Booby

Francis Toldi

From time to time I cease my toil,  
And take the phone in hand,  
To hear if any bird's about,  
To seek on sea or land.

One day in June I called and heard  
The birders out of joint;  
They said a booby had been found  
At Año Nuevo Point.

At Kilauea Point I've seen  
Some Red-foots in a tree,  
And once I chased a Blue-foot at  
the stinking Salton Sea.

The Browns abound in Mexico  
Along the western shore;  
In Guaymas, Kino, Manzanillo,  
In Mazatlan, and more.

Now this was one I had to see,  
On which I must insist  
For this was Sula dactylara —  
The one not on my list!

I know some lucky birders who  
Can chase a bird on any day.  
No problems with the boss or mate —  
At least that's what they say!

A week or two went zipping by  
Before I had my chance.  
July the third would surely be  
The day I join the dance.

I trudge on through the dunes at dawn  
Setup my scope and stare  
Lots of gulls and cormorants,  
But not a booby there.

The bird of course, was there next day,  
And the day after that, I heard.  
I have to try again to find  
That cotton-pickin' bird!

Again at dawn I make the trek  
I follow every rule  
For when and where to see the bird —  
This time I'll be no fool!

I wait for the mists to clear, while rays  
Illuminate the sea  
The setting is as splendid as  
Most any sight can be  
But when at last it all comes clear  
I have to curse my fate:

The rock is bare —  
No booby there!  
I must despair!  
Oh how wretched is my state!

By now all my friends have seen the bird  
And some have seen it twice.  
"You should have been here yesterday,"  
They offer as advice.

This time I'll try a different tack  
I'll fill this dreadful void.  
I'll seek it in the afternoon —  
Who needs to be employed!

Surrounded by the elephant seals  
I watch the sun begin to set  
No booby's standing on the isle:  
Just me, the gulls, a murrelet.

What have I done to anger fate,  
That it should treat me so?  
I try to do my very best  
for family, friend and even foe!

The fates have spoken all too clearly,  
They mean to treat me quite severely.  
This bird is one I'll never sight...  
On second thought, perhaps I might!

On Tuesday morn, again at dawn,  
With fog all swirling round,  
Just little cottontails and I  
Leave tracks upon the ground.

The glorious dawn lights up the isle,  
The fog has laid it bare..  
With trembling grip,  
I scope the strip,  
r bite my lip —  
A solitary bird is there!

Booby-sized with white on back,  
Blackish legs and tail and mask,  
A cone-shaped bill of yellow-green —  
for what more could I ask?

I watch it as it peeks and preens,  
Admire its every plume,  
While all about the sea rages on,  
With wind and spray and spume.

And then I watch it stretch its wings,  
It almost seems to yawn.  
It lifts and flies off to the north,  
Into the misty dawn.



## New Data on Dolphins

New research on dolphins suggests that, in addition to a large brain, they may share humanity's less desirable traits.

In 1991, scientists found dead harbor porpoises along Scotland's shores. Postmortem work showed that they had been beaten to death. It took several years and videos of actual events to reveal that the culprit was the bottlenose dolphin.

This was substantiated by Richard Connor of the University of Massachusetts who found that Australia's famous "friendly" dolphins formed gangs that roamed the sea clashing with others while trying to steal mates.

Chicago Zoological Society biologist Randall Wells studied Florida's bottlenose dolphins, finding that the marine mammals stay with their mothers for 3 to 6 years, before joining groups made up of juvenile animals. Females reach sexual maturity when they are between 5 and 10 years old. "Right after they give birth, some females go off alone," Wells says. "Then they often group with other mothers that have young of the same age. These nursery groups may consist of 10 to 14 individuals, including the young. "You see tremendous flexibility," he adds. "Some females raise their young alone." (Like humans, some dolphins need a "village to raise a child" while others are single mothers.)

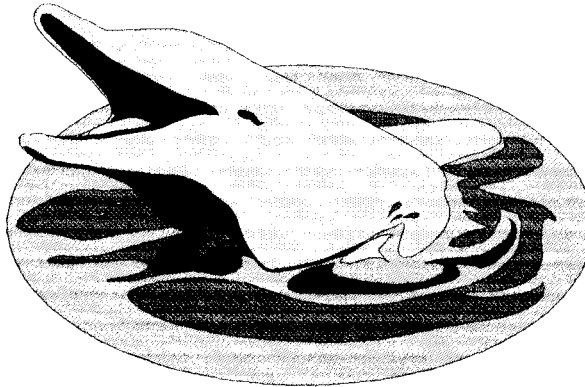
Few dolphins reach 50 years of age, and those that do are usually female. Males usually are more scarred than females, suggesting more violence in their lives and a possible explanation as to why they do not live as long as females.

Although some mature males become loners, most pair up with other males when they reach maturity. Wells has observed bonded pairs of males together for as long as two decades. But there is no evidence that these males have better breeding success than lone males.

Female dolphins in Connor's study may form loose associations with other females in small groups. Mature males, however, engage in two more complex levels of social behavior. "On one level,

you have stable pairs or trios," Connor says. "On another level, you get alliances between the stable groups." These represent what he calls "alliances of alliances."

Wells has not seen alliances of alliances in the Atlantic bottlenose. In fact, only one other species is known to engage in this type of social behavior, says Connor: humans. People form alliances of kin groups, villages and nations that fight other kin groups, villages or nations. Similarly, male dolphin groups form alliances to fight other male dolphin groups. This makes dolphin social life "extremely



intense," says Connor, "like an urban street gang or a tribal society where the price of social mistakes may be pronounced physical costs."

Relationships with females may be one of the underpinnings of the male-to-male bonds. Connor has found, however, that males forming an alliance "shadow" one another. "The physical association is quite clear," he says. "They surface together with synchronicity"

An alliance of two male groups may prowl the sea together, or a new, complicated twist might take place: A third group might appear, bond with one of the other groups already in an alliance and then team with that group to drive off its former ally. The undercurrents driving these shifting alliances remain unknown.

When male groups clash, the disputes can lead to intense fighting. In combat the dolphins may use teeth and fins, which can deliver powerful blows, but the most potentially lethal weapon is the tail. "It's very, very powerful," Connor says. "They could just blast you with their tails.

If one did it to you, you'd be dead. Your ribs would be broken, your liver shredded, your lungs collapsed."

Although the males may use their tails against one another, whether they do so against other enemies is not clear. Biologists have evidence that the bottlenose uses only its head and beak on the harbor porpoises found dead in Scottish waters. But those porpoises are smaller than the dolphins and seemingly pose no threat.

What about sharks? Popular legend says that dolphins attack sharks, ramming them with their heads. In fact, this behavior is unlikely, both Connor and Wells contend. About 31 percent of Sarasota Bay's bottlenose dolphins bear healed shark bites. However, says Wells, "Sharks and dolphins show a natural toleration of each other. They are not mortal enemies."

"Our little dolphins are not going to beat up a large tiger shark," notes the scientist. "It would be like hitting a tank." Generally, the dolphins flee from dangerous sharks. On one occasion, Connor saw an eight foot juvenile great white shark quietly cruise in among a group of resting dolphins. "The dolphins started leaping out of the water and racing away and didn't stop for 10 minutes," he says. "No one has seen wild dolphins beat up sharks."

Shark Bay dolphins do occasionally put the bite on human bathers, however. These dolphins are noted for often letting people touch them, but when the touching gets to be too much for the dolphins, they warn the humans by thrashing their tails in agitation. "Humans don't respect what they don't fear," says Connor, so people often ignore the signs. An agitated dolphin may bite. Fortunately the wound is usually superficial — another warning.

The dangers of the open sea perhaps explains the need for alliances. Extra sets of eyes, ears and tails may be essential to survival in the ocean, even for dolphins. "The sea," adds Connor, "is sometimes a scary-as-hell place to live."

*Information is from an article by Roger DiSilvestro in the August/September issue of National Wildlife.*



# Gifts and Bequests

Kass Sanginiti and L. Kirkham in memory of Nancy Jean Chow

Barbara Hasten

Sequoia *NEEDLES* is published monthly except in January, July and August. Members are encouraged to submit material to be published in the *NEEDLES*. The deadline for the submission of materials is the first day of the month preceding publication. These may be original articles, original artwork or cartoons, or uncopyrighted material from other sources. Items dealing with conservation issues must be submitted to the Conservation Committee prior to publication.

Information for all officers and chairpersons should be mailed to 30 West 39th Ave., Suite 202, San Mateo, CA 94403-4561. Please send **RENEWAL MEMBERSHIPS** directly to National Audubon in the envelope accompanying your renewal notice.

Please send **LATE RENEWALS** or **NEW MEMBERSHIPS** through Sequoia Audubon Society to insure continuity of newsletter or magazine subscriptions.

SEQUOIA AUDUBON SOCIETY'S WEB PAGE'S URL is <http://www.belmont.gov/orgs/sas/>

## OFFICERS

|                |                  |          |
|----------------|------------------|----------|
| President      | Francis Toldi    | 344-1919 |
| Past President | Anne Moser       | 324-1718 |
| Vice-president | Marilyn Noah     |          |
| Secretary      | Barbara Arrais   |          |
| Treasurer      | Tom Vanden-Bosch | 369-8305 |

## DIRECTORS

|                 |                      |          |
|-----------------|----------------------|----------|
| Term ending '99 | Sue Cossins          | 347-9358 |
|                 | Al Jamarrillo        | 712-1272 |
| Term ending '00 | Gary Deghi           | 726-1340 |
|                 | Eileen Jennis-Sauppe | 726-1081 |
| Term ending '01 | Merry Haveman        | 344-2146 |
|                 | Cliff Richer         | 873-1754 |

## STAFF

|                 |          |
|-----------------|----------|
| Celinda Sanchez | 345-3724 |
|-----------------|----------|

## STANDING COMMITTEES

|                       |                      |          |
|-----------------------|----------------------|----------|
| ACR Hosting           | Debbie Frantz        | 571-6759 |
| Audit                 | Rick Baird           | 574-1067 |
| Christmas Count       | Robin Smith          | 325-3306 |
| Conservation          | Eileen Jennis-Sauppe | 726-1081 |
| Education             | OPEN                 |          |
| Field Trips-Weekday   | Nick Coiro           | 349-1834 |
| Weekends              | Merry Haveman        | 344-2146 |
| <i>NEEDLES</i> Editor | Cliff Richer         | 873-1754 |
| Circulation Editor    | Sue Cossins          | 347-9358 |
| Programs              | Sue Cossins          | 347-9358 |
| Publicity             | OPEN                 |          |
| Membership            | OPEN                 |          |
| Finance/Budget        | Rick Baird           | 574-1067 |
| Hospitality           | Sue Cossins          | 347-9358 |



## SEQUOIA AUDUBON SOCIETY

30 West 39th Avenue, #202  
San Mateo, CA 94403-4561

NON-PROFIT ORG.  
U.S. POSTAGE PAID  
SAN MATEO, CA.  
PERMIT NO. 293

We Invite your membership in the National Audubon Society & SAS. To join, please complete and mail this form with payment to SAS, 30 West 39th Ave., #202, San Mateo, CA 94403

☐ National Audubon Society Membership

New \$20 (1 year) Student/Seniors \$15

Members receive *Audubon Magazine* & *NEEDLES*.

Make checks payable to National Audubon Society.

☐ **Needles** subscription only. \$15 for 9 issues

☐ **Donation:** SAS appreciates your tax-deductible donation which helps fund the chapter's education, conservation and ongoing activities.

For membership renewal information call National Audubon Society at (800) 274-4201

Name \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State \_\_\_\_\_ Zip \_\_\_\_\_

Telephone Number \_\_\_\_\_

7XCH C16

HOWARD BATHURST  
200 RUSSELL WAY RD  
WOODSIDE, CA 94062

Printed on Recycled Paper by O.I.C.W.   
Time Valued Material - Please Do Not Delay