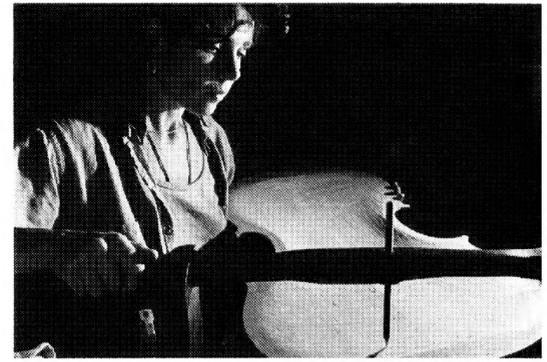


# The ACADEMY NEWSLETTER

July/August 1989



## Traditional Arts



Catherine Favre

The Traditional Arts programs at the Academy of Sciences offer a unique opportunity for visitors to see and experience traditional foods, music and folk art from all over the world. These programs take place each Saturday in Wattis Hall, and are made possible through a generous gift from the Paul L. and Phyllis Wattis Foundation. All programs begin at 1:00 p.m. For more information, call (415)750-7142.

**July 1**—Motherstone, a singing ensemble of five women, performs *a capella* music in the Afro-American tradition, drawing on gospel, blues, jazz and spirituals.

**July 8**—No program

**July 15**—Karen McKie expresses the history of black women through her realistic hand-sculpted dolls, which include a stately Maasai woman, a Louisiana sugar cane cutter and a New York bag lady. Karen demonstrates the clay modeling techniques and the process of doll-making.

**July 22**—A native of Oslo, Leif Sorbye sings and plays Norwegian folk songs on the octave-mandola and guitar, augmented with traditional folk tales.

**July 29**—Members of the local Peruvian community model regional costumes from the private collection of Martha Espejo.

**August 5**—European-born Catherine Favre demonstrates the construction of the violin, including wood carving and the principles of tap tuning and acoustics.

**August 12**—The Wajumbe Children's Cultural Ensemble performs dances of African origin from Brazil and the Caribbean.

### Members' Meeting—July *I Was A Bird Slave on the Farallon Islands*

Wednesday, July 12

2:00 and 7:30 p.m.

Thursday, July 13 7:30 p.m.



Stephen F. Bailey

The Farallones are a small group of islands 25 miles west of San Francisco. These remote islands are federally protected and because access to them is limited, a rich variety of wildlife thrives. The Farallon Islands host four species of marine mammals and the largest breeding colony of sea birds in the contiguous United States with eleven species including gulls, murres, cormorants and auklets.

On Wednesday, July 12 at 2:00 and 7:30 p.m. and Thursday, July 13 at 7:30 p.m., Dr. Stephen F. Bailey, Ornithologist and Collections Manager in the Academy's Department of Ornithology and Mammalogy, shares his experiences as a volunteer "bird slave" for the Point Reyes Bird Observatory. In a slide presentation, Dr. Bailey will give a rare view of these beautiful islands and talk about the joys and difficulties of daily life at this remote field station.

### Members' Meeting—August *Working With The Kuna*

Wednesday, August 9

2:00 and 7:30 p.m.

Thursday, August 10

7:30 p.m.



M. Marcus

The Kuna are a small group of native people that live on the San Blas Islands in Panama's Gulf of Darien. In the 19th century, they migrated from the Darien Peninsula, but continue to farm their lands on the Atlantic Slope that stretch from the canal to the Columbian border.

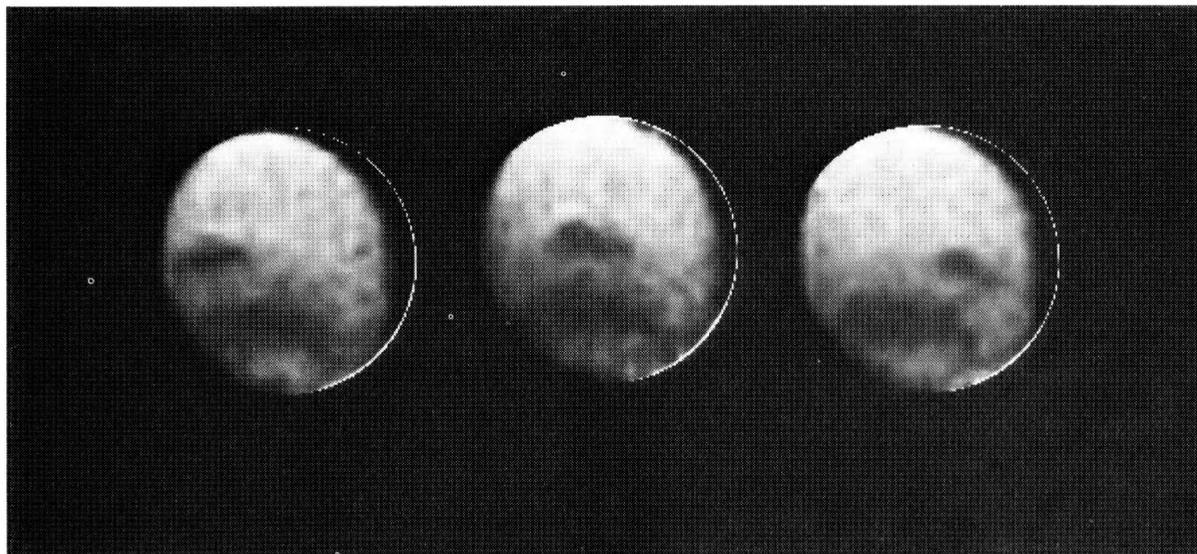
For centuries Kuna women have been making reverse-appliqué molas, colorful panels covered with intricate designs. Molas provide the Kuna with their main source of cash income.

Greg de Nevers, resident biologist at the Academy's Pepperwood Ranch, will discuss the two years he spent living and working with the Kuna while documenting the botanical resources of their land. He will talk about the Kuna lifestyle, adaptation to their environment and their struggle to preserve the ownership of their lands.

Next month's speaker is Dr. Luis Baptista, Chairman of the Academy's Department of Ornithology and Mammalogy.

Lecture:

## *Neptune and Beyond* August 17 7:30 and 9:00 p.m.



*These three images of Neptune taken by Voyager on April 3 reveal new atmospheric features.*

In the cold, dark void of the outer solar system, Neptune orbits 3 billion miles from the sun, completing one revolution every 165 years. Neptune is the fourth largest planet in the solar system, and even through today's high-powered telescopes, this large, celestial body appears as a small, bluish-green ball.

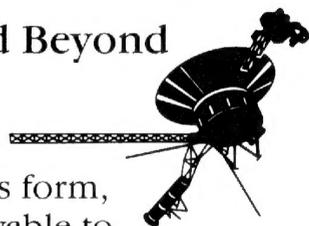
On August 20, 1977, Voyager was launched on an ambitious 12-year odyssey of planetary exploration. This versatile spacecraft has completed surveys of Jupiter, Saturn and Uranus. Now, after traveling billions of miles, Voyager is bound for an August 25 encounter with Neptune and its moons. Intensive studies of the planet begin in June and continue

through September, 1989.

On Thursday, August 17 at 7:30 and 9:00 p.m., the Morrison Planetarium and The Planetary Society will host a pre-encounter presentation, "Neptune and Beyond," featuring Charles E. Kohlhase, Mission Design Manager of the Voyager Project at the Jet Propulsion Laboratory. In this special preview, Kohlhase will discuss Voyager's mission beyond the planets and present the latest images transmitted from space.

Advanced tickets for this special evening are \$3 for Academy and Planetary Society members and \$4 for non-members. To order tickets, please use the convenient order form below. For more information, call (415)750-7129.

### Ticket Order Form — Neptune and Beyond



Please send this form, your check payable to the Planetary Society and a self-addressed, stamped envelope to:

"Neptune"  
The Morrison Planetarium  
California Academy of Sciences  
Golden Gate Park  
San Francisco, CA 94118

Name \_\_\_\_\_

Address \_\_\_\_\_

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

Daytime phone \_\_\_\_\_

Enclosed is a check payable to the  
Planetary Society for:

\_\_\_\_\_ member tickets at \$3

\_\_\_\_\_ guest tickets at \$4

\_\_\_\_\_ 7:30 p.m. \_\_\_\_\_ 9:00 p.m.

If my first choice is sold out, please  
reserve ticket(s) for the alternate time.  
(check box)

## *Free First Wednesday*

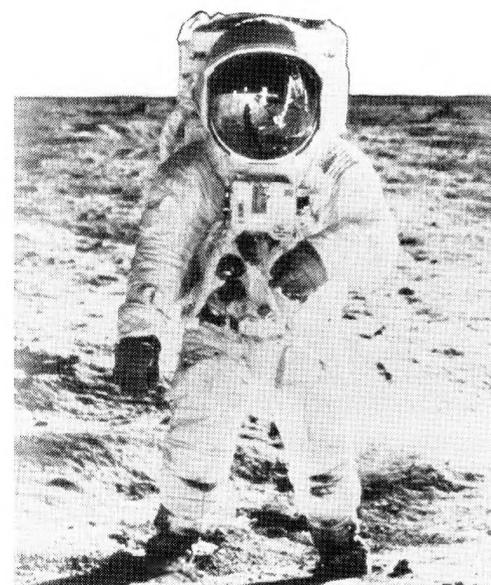
*July 5/August 2*

On the first Wednesday of every month, the Academy opens its doors to the public free of charge. In addition to the aquarium, permanent exhibits and DinoFest, visitors are invited to enjoy a free special program of classical music in the Morrison Planetarium at 7:00 p.m. Experience lesser-known works along with a few familiar favorites under the starry skies of the Planetarium dome.

### *Sky Show*

## *Tranquility Plus 20*

*Opens July 1*



On July 20, 1969, the lunar module "Eagle" touched down on the moon's Sea of Tranquility, making the first manned landing on the surface of our nearest neighbor in space. Eventually, twelve men walked on the moon, literally going where no man had gone before. What has America's space program accomplished since then, and where are we now headed in our exploration of the stars? This newest sky show will examine these questions and more, beginning on July 1 and continuing through September 10. For Planetarium information, call (415)750-7141. Just a reminder that Laserium programs are presented every Thursday through Sunday. For times and information, call (415)750-7138.



## Do You Have Plants for the Future?



The Academy's Exhibit Department is currently creating dioramas for the newest hall, "Life Through Time," scheduled to open next year. Outside the hall will be seven planted areas that will display living plant fossils or close living relatives of extinct plants depicted in the exhibit hall. A number of these plants are difficult for us to obtain, and we are asking for your help in locating them. This is a once-in-a-lifetime opportunity for members to donate a living tree or cuttings to be added to our exciting new exhibit hall. The following is a list of what we need:

**Cycads:** Entire plants, small to large

**Ginkgos:** Entire trees, five to twenty feet tall; branches, two to five feet long

**Monkey Puzzle:** Entire trees, five to twenty feet tall

**Tree Ferns:** Entire plants, two to twenty feet tall

**Redwoods:** Entire trees, ten to twenty feet tall

**Bald Cypress:** Entire trees, two to twenty feet tall

**Magnolia:** Entire tree, 6-12" trunk diameter



For more information, please contact Nick Cavagnaro at (415)750-7274 or (415)957-9442.

## Summer Education Classes

Learn more about the natural world this summer with one of the many fascinating classes offered by the Academy's Adult Education program. There are still openings in some of the best courses:

**Stargazing for Backpackers**  
July 25–August 15 (4 Tuesdays)  
7–9 p.m.

A course in the Morrison Planetarium designed to help you decipher the night sky when you are far from the city lights. \$40 members/\$50 non-members.

**Marine Mammals of California**  
July 11–August 15 (6 Tuesdays)  
7–9 p.m.

Become acquainted with some of the most fascinating sea animals while learning about their anatomy, physiology, reproduction and behavior. \$60 members/\$70 non-members.

**Eclipse**  
July 13–27 (3 Thursdays)  
7–9 p.m.

An in-depth look at this phenomenon and a historical overview of human understanding of the eclipse ranging from Stonehenge to current methods of prediction. \$30 members/\$40 non-members.

**Lake County Volcanic Highlands**  
July 22–23

This is a new expedition to the volcanic peaks of Cobb Mountain,

Boggs Mountain and Mounts Hannah and Konocti. We will explore Pomo Indian village sites, "geyser" steam vents and outcrops of obsidian and rhyolite. There will be several short hikes, scenic drives and car camping on Saturday night. Pre-trip meeting Wednesday, July 12, 7–9 p.m. \$85 members/\$100 non-members. (Fees cover campground entry but do not include transportation, food, or camping gear. Van transportation is \$20 extra).

**A Day with Arthropods**  
July 23 10 a.m.–4 p.m.

Explore the world of scorpions, pseudoscorpions, spiders, sea spiders, daddy long-legs, horseshoe crabs, millipedes, centipedes and ancient trilobites. With microscopes, we will discuss their life histories, comparative anatomy and evolution. \$25 members/\$35 non-members.

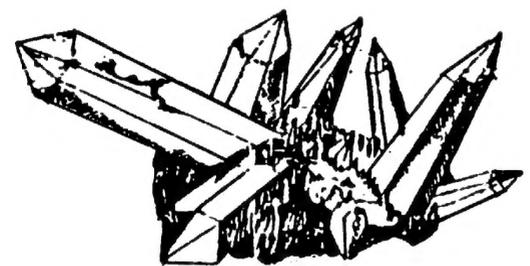
**The Mythology of the Cosmos**  
September 6–27 (4 Wednesdays)  
7–9 p.m.

Join us for this exciting study of cosmological myth, the stories created by people through the ages to explain time, the stars and the universe. \$40 members/\$50 non-members.

If you are interested in any of these courses or have questions, call the Adult Education Office at (415)750-7100.

## Golden Gateway to Gems

The 35th annual Golden Gateway to Gems show of the San Francisco Gem and Mineral Society will be held August 5 and 6 at the San Francisco County Fair Building (formerly the Hall of Flowers) in Golden Gate Park. Hours will be 10-6 on Saturday and 10-5 on Sunday. The Academy will exhibit a wide variety of crystals from their collection including single and twin formations. Other events will include demonstrations of



lapidary, intarsia and faceting. Mineral collections from around the world will also be on display. Academy members will receive a 50-cent discount on the admission price.

## DinoFest Activities



In addition to the eleven automated dinosaurs, fossils, and skeletons featured in DinoFest '89, the Academy's Education Department will sponsor activities for children every Monday beginning July 10 between noon and 3 p.m., continuing through August 28.

DinoFest '89 will be on display until September 10.

Major funding for DinoFest '89 has been provided by the Bernard Osher Foundation and Mr. and Mrs. Alfred S. Wilsey with generous support from Chevron, the Koret Foundation, and Mother's Cookies. For more DinoFest information, call the Dino Hotline at (415)750-7142.

## New Gifts Support Special Programs

Several recent large gifts have added valuable support to the Academy's ongoing programs. **Apple Computers, Inc., Community Affairs** has contributed ten Macintosh IIcx computers and other Apple hardware and software to the LIFEmap display in our new hall of Life Through Time. Apple's gift of more than \$91,000 of computer equipment will allow visitors to interact with the LIFEmap display that traces patterns in evolution. **The Bank of America** has pledged \$115,000 to underwrite "Yosemite 100," a major exhibition for 1991. The exhibition will celebrate the centennial year of Yosemite National Park. **Wells Fargo Foundation** has contributed \$17,500 to the Discovery Room, which offers hands-on science experiences for everyone, but especially for youngsters and the visually impaired. **The Stanley S. Langendorf Foundation** has supported the Academy's extensive educational programs with a donation of \$10,000. These generous gifts make it possible for the Academy to continue its commitment to educating the public about the natural world.

## Academy Expeditions for 1990

The Academy's travel programs offer the world to you! Enjoy fun-filled days on an Academy Expedition in beautiful locations while experts guide you through the inspiring world of natural history.

### *Antarctica*

*January 13-26*

*Lecturer: Dr. Kathy Ann Miller*

Penguins, humpback and killer whales, leopard and Weddel seals are the stars of this popular, spectacular journey to the Antarctic Peninsula.

### *Tanzania Safari*

*February 1-16*

*Lecturer: Beth Dunbar*

A tent and lodge safari planned to coincide with the great migration in the beautiful Serengeti. Destinations include Lake Manyara, Ngorongoro Crater, the vast Serengeti and some time in Nairobi. Price: \$4,091

### *Belize*

*February 18-March 2*

*Leader: Sharon Mastola, Founder & Director, Belize Zoo*

Coral reefs, a wealth of wildlife, and ancient Mayan ruins including Tikal. Price: \$2,132

### *Baja California*

*March 20-April 1*

On this cruise aboard the M.V. Sea Lion, we will travel along the Pacific coast of Baja California to visit elephant seal colonies, whale lagoons and then sail down to the Sea of Cortez to explore uninhabited desert islands. Price: \$2,900-\$4,100

### *Springtime Gardens of England*

*May 9-26*

A generous sampling of gardens and arboretums mixed with visits to some of the great houses graced with elegant gardens.

### *Indonesia: Secret Islands*

*East of Bali*

*June 3-20*

*Lecturers: Dr. John McCosker and Dr. Stephen Jay Gould*

A cruise aboard the Society Explorer offers a search for rare

bird species, the Komodo dragon, snorkeling in warm waters and a vast panalogy of cultures.

Price: \$5,595-\$8,505

### *In the Wake of the Vikings:*

*Bergen to Reykjavik*

*July 26-August 10*

Visit the fjords of Norway, see the rugged and isolated Shetland and Faroe Islands, and explore Iceland, "the Land of Ice and Fire," while cruising in comfort aboard the M.S. Polaris.

Price: \$3,450-\$4,880 plus air fare

### *Alaska and the*

*Queen Charlotte Islands*

*September 9-23*

*Lecturer: Dr. David Kavanaugh*

An in-depth exploration of the coastal wilderness of British Columbia and Southeast Alaska, including the magnificent and seldom-visited Queen Charlotte Islands. Cruise in comfort aboard the M.V. Sea Lion.

Price: \$3,700-\$5,380

### *Fall in Vermont*

*September*

The wilds of Vermont, special museums, conservation sites and farms, all graced by the colors of autumn.

Price: Approximately \$2,400

### *Pakistan and India*

*September 25-October 17*

*Lecturer: Nancy Pickford*

The most fascinating and least explored areas of Northern Pakistan in the High Karakoram with the fabled vale of Kashmir and Ladakh in the mighty Himalayas.

Price: \$5,915

### *Brazil and Argentina*

*November*

Sights of Rio and Iguassu National Park, then southward to explore Argentina's glacial Andean district, the penguins of Punta Tomba, followed by the vast array of marine and bird life of Peninsula Valdes Reserve.

Price: \$4,494

For information on Academy expeditions, call the Academy's Travel Office at (415)750-7222.

## Whale Fountain Turns 50 This Year



Visitors pose before it, children run and play around its base; it has been photographed from every conceivable angle (including a helicopter) and has been identified as flying fish, dolphins and birds in flight. It is a continuing source of pleasure and delight and, since it was permanently ensconced in the central courtyard, it has become as much an identifiable symbol of the Academy as the cable car has become for San Francisco. "It" is the "Fountain of Whales," a playful pair of black granite cetaceans that permanently frolic in the central courtyard of the Academy. In 1938 Robert B. Howard, an eminent San Francisco sculptor, was commissioned by the city to create a work of art to be the focal point in the San Fran-

cisco building at the Golden Gate International Exposition on Treasure Island. Inspired by a story of a whale that swam inside the Golden Gate, Howard created a 14-ton pair of playful whales that was centered in an ornate granite pond, graced at each end with nymphs riding dolphins. A great source of admiration for the millions who visited the Exposition in 1939 and 1940, the fountain was not destroyed when the Fair ended, but was moved to a spot near the old Beach Stables in Golden Gate Park. In the years that followed, the question of what should be done with this sculpture came up repeatedly. Some people thought it should be placed in the Marina district, while others wanted to settle it between the War Memorial Opera House and the Veterans' Building. In 1947 an appropriation of \$5,000 was approved to place the fountain at the base of Coit Tower, but the plan failed. Finally, in 1952, a decision was made to permanently settle the "Fountain of Whales" at the Academy of Sciences.

With the combined efforts of the Art Commission, Recreation and Park Department and the Academy, the whales once again began to spout water in 1957 and continue to delight over a million and a half Academy visitors each year.

## An Opportunity for Academy Members

You can participate in an income and philanthropic investment program for \$5,000 or more in cash, securities or other property. In return, the Academy pays lifetime income to you and/or another person. Last year, one plan paid participating Academy members almost 10% income. With this program, you can gain other important benefits:

- Increase your income
- Reduce your income and estate taxes
- Avoid capital gains on sale of appreciated property
- Reduce your investment management responsibilities
- Enhance your retirement income
- Make a lasting gift to the Academy

When your gift becomes part of the Academy Endowment Fund, your commitment to science will continue in perpetuity.

For additional information, please telephone or write:

Development Office  
Life Income Program  
California Academy of Sciences  
Golden Gate Park  
San Francisco, CA 94118

(415)750-7216

Name \_\_\_\_\_

Address \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Daytime Phone \_\_\_\_\_

## Do Some Spring Cleaning for Science

Several research departments at the Academy are in need of equipment for their work that may be gathering dust in your basement, attic or garage. Birds & Mammals and Development could each use a refrigerator, Herpetology needs an upright freezer but their ultimate wish is for an IBM (or clone) computer or a Mac SE. Anthropology wants a good set of photo strobes and/or photo flood lights to record artifacts in the collection. Entomology could use some locked filing cabinets, two com-

puter tables and a silver lenticular projection screen. Cleaning up won't be a problem for the Aquarium staff if a washing machine comes their way, and a freezer would be a great help to the folks at Pepperwood Ranch. Ichthyology just reported that their vacuum cleaner is permanently disabled and could use a canister-style vacuum with attachments. If you have any of these items and would like to donate them to a worthy cause, call the Public Information Office at (415)750-7142.

591  
Time Dated Material  
Please Expedite

Golden Gate Park  
San Francisco, California 94118-9961  
(415) 221-5100

Open daily from 10 to 7  
July 4 through Labor Day

July/August 1989



Non-Profit Organization  
U.S. Postage Paid  
Permit No. 7544  
San Francisco

## July/August at the Academy

Continuing Exhibits:

DinoFest '89

### July

- 1 Sky Show, "Tranquility Plus 20" opens
- 1 Traditional Arts—Afro-American dance, 1:00 p.m.
- 4 Summer hours begin
- 5 Free First Wednesday
- 10 DinoFest Children's Activities 12-3 p.m.
- 12 Members' Meeting "I Was a Bird Slave on the Farallon Islands," 2:00 and 7:30 p.m.
- 13 Members' Meeting, 7:30 p.m.
- 15 Traditional Arts—Dollmaking, 1:00 p.m.
- 17 DinoFest Children's Activities 12-3 p.m.
- 22 Traditional Arts—Norwegian Folk Music, 1:00 p.m.
- 24 DinoFest Children's Activities 12-3 p.m.
- 29 Traditional Arts—Peruvian Costumes, 1:00 p.m.
- 31 DinoFest Children's Activities 12-3 p.m.

### Zimbabwe Baskets



Art, craft and spirit are skillfully woven together in distinctive tribal baskets created by Zimbabwean women elders. These extraordinary examples of African vernacular design reflect the sacred traditions of a vanishing native culture. A brief profile of the artist and a description of the materials and patterns she uses are included with each basket. We invite you to appreciate the noble austerity of the basketry and sculpture of the Zimbabwean people, whose artistry elevates the simple to the sublime.

### August

- 2 Free First Wednesday
- 5 Traditional Arts—Violin Making, 1:00 p.m.
- 7 DinoFest Children's Activities 12-3 p.m.
- 9 Members' Meeting, "Working with the Kuna," 2:00 and 7:30 p.m.
- 10 Members' Meeting, 7:30 p.m.

- 12 Traditional Arts—Brazilian and Caribbean Dance, 1:00 p.m.
- 14 DinoFest Children's Activities 12-3 p.m.
- 17 Lecture: Neptune and Beyond 7:30 and 9:00 p.m.
- 21 DinoFest Children's Activities 12-3 p.m.
- 28 DinoFest Children's Activities 12-3 p.m.